WESTERN ORGANIZATIONAL CHANGE CAPACITY THEORY AND ITS APPLICATION IN CHINESE PUBLIC HEALTH ORGANIZATIONS: A MULTIPLE CASE ANALYSIS

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WESTERN ORGANIZATIONAL CHANGE CAPACITY THEORY AND ITS APPLICATION IN CHINESE PUBLIC HEALTH ORGANIZATIONS: A MULTIPLE CASE ANALYSIS

As public health reform becomes a crucial task for governments in both China and the United States, public health organizations are required to adopt changes based on reform policy. However, little research has focused on organizational change capacity and its application in Chinese organizations, especially public health organizations. Organizational Change Capacity theory (OCC), developed by Klarner and his colleagues (2007), is a Western theory that was employed in this study to understand Chinese public health organizational change. The OCC framework indicates the change capacities that organizations should possess when pursuing successful organizational change. The main purpose of this dissertation is to understand public health organizational change in China during the country's national health reform by applying Western OCC theory to Chinese public health organizations that have already achieved success or have remained challenged in implementing organizational change during the health reform. This study seeks answer to these questions: Is the OCC theory applicable in Chinese public health organizations? How should the OCC framework be modified to best fit Chinese public health organizations?

In this study, 72 participants from twelve Chinese public health organizations were recruited for in-depth interviews and follow-up questionnaires that asked questions about their experiences during their organizational changes. The participants included leaders, mid-level managers, employees, and clients/partners in public hospitals, community health centers, and district health bureaus in the cities of Beijing and Xi'an. During the comparison

of common elements across the six successfully changed sites and the six remain challenged sites, a new Chinese Organizational Change Capacity theory (CNOCC) with nine main themes emerged. The themes consist of transformational leadership, implementation strategy, member's positive character, communication and transparency, government support, member's consensus on change, healthy internal system, member's self-improvement, and cooperation with external parties during the change. The CNOCC framework developed from this study provides a guideline and a tool for Chinese public health organizations to evaluate their change capacity levels. Furthermore, it offers a theoretical foundation for researchers to design interventions that help Chinese public health organizations increase their change capacity and achieve successful change.

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Chapter 1: Statement of Problem

In the past 30 years, China has been experiencing significant economic growth. Since the 1980s, China has undergone dramatic social and political transitions, largely due to market-oriented economic system reforms. According to a report released by the World Health Organization (WHO) about Chinese health and economic development, China's Gross Domestic Product (GDP) grew by 9.4% per year on average during these 30 years. However, during the same period, the socioeconomic transition in China has caused increasing disparities in education, income, and, especially, in public health (Li & Wei, 2010; Wu, 2010; Goh, Luo, & Zhu, 2009). Chinese people now live longer and are healthier than ever before, yet, health inequalities have been increasing among people of different genders, living conditions, and socioeconomic statuses (Zhang & Kanbur, 2003). While the gap between rich and poor in China has been studied and discussed extensively, relatively little analysis is available on inequalities in other areas of human development, especially in public health.

Previous research on Chinese health inequalities has focused on several primary topics. Some studies examined the question of education and health inequality among young people in China, noting that disparities between urban and rural areas have increased substantially since the era of economic reforms (e.g., Zhang & Kanbur, 2003). Other researchers focused on analyzing particular health problems in China, including case-control studies of smoking and lung cancer (e.g., Liu, 1991), analysis studies of obesity and overweight trends (e.g., Wu, 2006), studies of sexual behavior and contraceptive use (e.g., Parish et al., 2003), and studies that concentrate on other health problems (e.g., Zhang, Casswell, & Cai, 2008). Such research

stimulated several program design and evaluation studies that provide examples of successful disease prevention and health promotion approaches (e.g., Chou, 2006).

Currently, the Chinese government considers health inequalities a serious issue that may threaten the stability of society and slow the further development of the nation. In recent years, the government has been increasingly willing to spend financial and other resources on public health, and it is codifying its public health goals in official publications. For instance, the Government Report from the National Congress Meeting (National Development and Reform Commission, 2009) set the following goal for health care reform: by 2020, build a basic health care system that can provide safe, effective, convenient, and affordable health services to urban and rural residents. In a subsequent Government Report from the National Congress Meeting (National Development and Reform Commission, 2011), the Government recommended that experimental reform in public health care system, public hospitals, and local medical and health institutions be initiated right away, and it provided recommendations for implementing pilot reforms. Today, experimental reforms are being conducted all over China by local organizations, communities, and various agencies at different levels of government. Large-scale reform in public health is clearly needed at this point. This need for reform provides great opportunity for researchers to study public health management and public organizational change.

In keeping with the need for the reform and change described above, Chinese health researchers are increasingly viewing organizational change as an effective way of improving the business processes that have implications for public health; increased attention is being paid to providing organization managers with the knowledge and skills to better manage

change (Zhao et al., 2008). Chinese researchers have also been conducting research on planned organizational change, including the relationship between the role of public relations and the sense-making process (Luo, 2011), the direct and indirect effects of organizational commitment on employees' stress levels and job satisfaction (Lu, Siu, & Lu, 2010), and the impact on organizations caused by the political participation of organizational leaders (Ahlstrom & Ding, 2014). These studies are primarily based on well-established research approaches and are informed by various theories. For example, Luo (2011) designed her research methods based on several Western theories of sense-making and public relations. She also mentioned in her report that understanding basic concepts of organizational theories makes it possible for her to study organizational change. Thus, it seems strategic for researchers who are trying to address health inequality in China to have a theoretical view of how organizational change in the field of public health could impact population health.

The Social Ecological Model (SEM) is one possible framework imported from the West for facilitating positive change within the Chinese public health system that, thus far, has not been widely considered when planning and implementing health promotion programs in China. The levels of this social environmental system include individual, interpersonal, community, organizational, and other societal factors, all of which have both direct and indirect influences on people's lifestyles, behavior choices, and health statuses (Israel, Checkoway, Schulz, & Zimmerman, 1994; McLeroy, Bibeau, Steckler, & Glanz, 1988). Many of the improvements in a population's health occur through organizations as pivotal strata in the social ecology of a country. From an ecological systems point, organizational change is also an activator for larger-scale community change and thus can impact the system

as a whole (Kegler, Norton, & Aronson, 2008). Thus, if organizational development programs in China are informed by social ecological approaches, public health agencies may optimize their abilities to obtain and share resources. They may also implement actions collectively with community participation, thereby directly affecting quality of life for broader groups.

Evidence from Finland demonstrates great achievement on building health and well being throughout Finnish society by using different levels of organizational change, leading to a significant positive impact on population health. Finland's successful health reform employs a "Health in All Policies" theme, which means that people's health and well being should be a value shared by all social sectors (WHO Regional Office for Europe, 2001). The report of this health reform indicates that connecting the health sector with other government sectors, industries, and nongovernmental organizations is essential for local policy implementation, thus supporting a social ecological approach to a healthier population (Finland Ministry of Social Affairs and Health, 2006).

Western models that are informed by SEM principles may have greater applicability to organizational change in China's quest to improve the public's health. Presently, the Chinese government is implementing a comprehensive health reform, which provides unique opportunities for researchers to study the applicability of organizational change frameworks that are predominant in Western countries. The present study focuses on the organization at an ecological level, thus promoting possible change that may happens inside an organization. The goal of this research is to understand what abilities the organization needs to have to implement a change, or what organizational factors from Western approaches may be useful

in gauging organizational capacity of change. Judge and Elenkov (2005) define organizational capacity for change as "a broad and dynamic organizational capability that allows the enterprise to adapt old capabilities to new threats and opportunities as well as create new capabilities" (p. 894). Other studies indicate that nearly 70 percent of planned organizational change activities fail. One of the most important causes of such failures is a lack of reliable and valid methods to assess and analyze an organization's capacity for change (Judge, 2009). If Chinese organizations are to change by adopting a new set of public health values, the first step is to make sure those organizations have the capacity to change.

In sum, an essential approach to solving health inequalities in China is to promote positive changes at all organizational levels, which further requires a comprehensive understanding of organizational change capacity. Thus, this dissertation explores the applicability of Western organizational change capacity theory, a theory consistent with social ecology approaches, in China. The following chapter provides a literature review to establish a basis for theories that may inform organizational change that is transferable to health-related organizations in China.

Chapter 2: Literature Review

Overview

As described in the last section, China has been experiencing dramatic economic growth in the past 30 years, which has led to great societal changes. Chinese people live longer today, but health inequalities among different groups are increasing. Presently, the Chinese government is increasingly willing to spend resources on public health improvement, and this willingness provides unique opportunities for researchers.

In Western countries, public health researchers find that conducting organizational change can be an effective way to promote healthy behavior than initiating change in individual level (Glanz, Rimer, & Viswanath, 2008). Organizational change involves innovation or transition in formal groupings such as commercial businesses, governmental agencies, educational institutions, and non-profit public enterprises. Researchers also found that determining organizational change capacity is a basic step to promote organizational change (Judge & Douglas, 2009).

Currently, China may benefit from applying advanced theories and successful practices in public health from other countries. This present study focuses specifically on public health-related organizations. The main purpose of this dissertation is to explore the applicability of Western organizational change capacity theory in China.

This chapter provides a comprehensive literature review, including a comparison of current public health condition between the U.S. and China, an overview of health-related

organizational level studies in both countries, and a brief introduction of organizational theories that are relevant for the present study.

Lessons from Each Other: Mutual Benefits on Public Health Development

The first part of this literature review is a comparison of current situations of public health development in both the U.S. and China. A systematic understanding of challenges and opportunities during health reforms is necessary for researchers who intend to study the health-related theory transformation between these two nations.

The following five main reasons offer a rationale as to why a comparison of health care reform between these two countries is important for this present study. First, such a comparison helps audiences in both China and the U.S. have a better understanding of current problems and solutions pertaining to public health disparities in each country. Second, in the path of health care development, the U.S. has experiences and theory-based approaches from which the Chinese health system can benefit. Third, China and the U.S. have similar challenges in dealing with public health disparities, such as high costs and inadequate insurance coverage. Knowing the similarities provides researchers and policy makers in both countries new opportunities to cooperate with each other and create the best solutions for health problems. Fourth, examining current policies and programs in health care reform may provide supportive resources and guide future researchers in China. Finally, a rationale analysis of both countries will help to test to applicability of Western theory in Chinese society. Comparing health care reforms shows the rationale of government actions when facing the same public health problems.

In response to growing public concerns over widening inequalities in health, the Chinese government officially established a new national health system reform plan in 2009, with a commitment of 850 billion RMB (approximately U.S. $125 billion) for the next three years. This reform had ambitious targets, including 90% health insurance coverage by the end of 2010 and universal coverage of essential health care by 2020 (Guo et al., 2010). China has already achieved health insurance coverage among 95% of its population: 1.295 out of 1.3397 billion people (Eggleston, 2012).

At the same time, the U.S. government is also implementing health care reform, which has both similarities and differences compared to China's reform (see Table 1). These two countries face the same challenges, such as high public and private health care costs and a lack of an effective insurance system. Additionally, each country also faces its own challenges. China uses scarce resources inefficiently while U.S. has difficulty with federal budget and administrative inefficiency. According to these key challenges, both countries designed several steps of action in their health care reforms.

Table 1. Health Reform in China and US

Health Reform	China	U.S.
Key Challenges	*Need for primary health care system *High out-of-pocket payments (fees that households are paying to get services are more than 18 times what they were in 1990) *Inadequate insurance coverage (access to primary care for poor people is still low, and financial protection against high healthcare expenses remains very restricted) * Escalation of costs (rapid cost	* Need for a public insurance plan *High public health care costs * Growth of private health care expenditures *Federal budget deficit * Administrative problems for patients and physicians (Garson, 2000; Iglehart, 2009)

	increases, compounding high out-of-pocket payments, and insufficient insurance have imposed further burdens on patients and their families) *Inefficient use of scarce resources (widespread inefficiency and low productivity weaken the health system's effectiveness and waste resources) *Misaligned incentives in the provider payment system and the purchasing of services (providers receive over 90% of their income from fees for medical services and medicines, particularly from dispensing drugs and performing procedures that require high-tech equipment) (Hu et al., 2008)	
Ongoing actions	*Increase medical insurance coverage for over 90% of the population *Increase government contributions to urban residents' basic medical insurance *New rural cooperative medical system * The establishment of an essential drug list system with higher reimbursement levels than other drugs *The construction and renovation of county hospitals, rural and town clinics, village clinics, and urban community medical service institutions *The provision of equal public	The Affordable Care Act *Expansion of Medicaid and The Children's Health Insurance (CHIP) Programs *Premium and cost-sharing subsidies to individuals *Premium subsidies to employers *Health insurance-related tax changes *Health insurance exchanges *Health benefits package *Cost containment *Improving quality of health system performance

	health services in both rural and urban areas via the establishment of standardized medical records, health screening systems, and strengthened specialized institutions, including mental health care, pediatrics, and maternity centers *The strengthening of disease prevention efforts and the broadening of national vaccination programs *The piloting of drug margin reforms in selected cities throughout 2009 (IMS Health, 2011)	*Prevention/wellness programs *Long-term care plans (Kaiser Family Foundation, 2011)

The comparison of health care reforms in both countries indicates that U.S. and China face similar challenges and threats in public health. Although it may be challenging for them to draw lessons from each other on policy change, they can greatly benefit from one another on relevant research methods and strategies. China may learn more from the U.S. in public health development, including the adoption and application of relevant theory.

The Importance of Organizational Theory in Public Health Development

A theoretical foundation is important to both research design and political decision-making. Bourke (2010) explained the importance of theory in five ways. First of all, theory provides an approach for how a topic is studied. The framework of theory shows the construction of study. Second, theory articulates key assumptions in knowledge development. Third, theory systematizes knowledge, enabling it to be transferable. Knowledge will not be changed in different places, even when using different languages. This is also the reason why Western theory can be transferred to China. Fourth, theory provides predictability. An

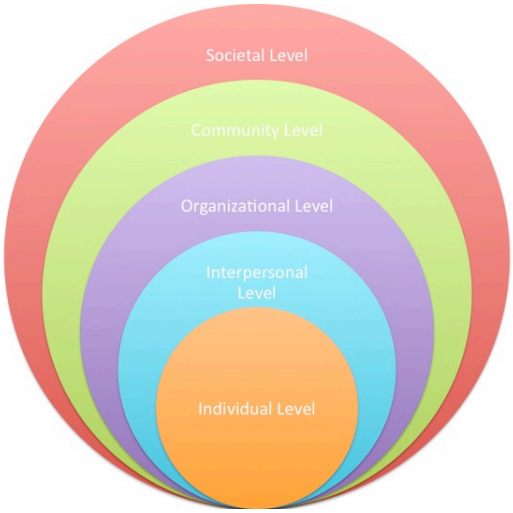
effective theory has the ability to predict the possible outcome of certain actions. The fifth and final reason is that theory enables comprehensive understanding.

A theory that can be applied worldwide also helps people to understand certain problems globally, such as health disparities. As the historical and geographical divisions become increasingly irrelevant, research must become more global. Without scholarly research, practitioners may over- or under-emphasize national differences (Naor, Linderman, & Schroeder, 2010).

Within all the different theories related to public health from Western countries, the Social Ecology Model (SEM) is most applicable. The Social Ecology Model, defined by Oetzel, Ting-Toomey, and Rinderle (2006), is a framework to examine the multiple effects and interrelatedness of social elements in an environment. SEM can provide a theoretical framework to analyze various contexts in multiple types of research and in conflict communication. According to SEM (see Figure 1), a social environment system includes several different levels. Individual, interpersonal, community, organizational, and societal factors should be considered when planning and implementing health promotion programs, because they have both direct and indirect influences on people's lifestyles, behavior choices, and health statuses (Israel et al., 1994; McLeroy et al., 1988). Individual-level behavior change focuses on intrapersonal factors such as knowledge, attitudes, beliefs, motivations, self-concepts, past experiences, and skills. Factors that influence individuals include opinions, behavior, advice, and support of friends, coworkers, supervisors, and influential others within organizational settings (Glanz et al., 2008). Broad change at the organizational level requires more complicated strategies that address both internal and external cultural and

environmental influences. Change strategies are most effective when they are aimed at multiple levels of organization while simultaneously taking the external environment into account (Embry, 2004).

Figure 1. Social Ecology Model



Adapted from Publichealthwatch (n.d.). *Violence Against women: A multi-level analysis, part 2: Defining a public health approach to violence prevention*. Retrieved from https://publichealthwatch.wordpress.com/2013/07/02/violence-against-women-a-multi-level-analysis-part-2-defining-a-public-health-approach-to-violence-prevention/

Researchers used to focus on the individual level, which brought about the development of numerous theories, such as the Reasoned Action Approach (Fishbein, 2008), the Theory of Planned Behavior (Icek, 1991), and the Health Belief Model (Rosenstock, 2000). Innovation theorists found in the 1960s that the individual was more willing to adopt innovation when the organization they belong to adopted it first, and the individual rarely adopted changes unless they were first accepted by the organization (Glanz et al., 2008). Much of population health improvement occurs through organizations. Achieving organizational change is a

shortcut to decreasing health disparities. To design research that promotes organizational change, theoretical evidence at the organizational level is necessary.

Applications of Organizational Theory in China

In recent years, Chinese researchers have worked closely with experts from Western countries and yielded numerous meaningful organizational studies. Some designed research with a theoretical foundation from the Western world, while others tested and then modified Western theories and models into Chinese society. Farh, Zhong, and Organ (2004) published a study on Organizational Citizenship Behavior (OCB) in China, in which they developed 10 dimensions of OCB in China based on Western OCB theory. They conducted the research with a comprehensive comparison of differences related to organizational change between China and the U.S., establishing a convincing argument on the importance of testing and modifying Western theory in China. Table 2 provides a summary of this culture difference comparison from their study. The authors presented cultural differences between these two countries according to four criteria, including organizational effectiveness, economic environment, legal and commercial infrastructure, and view of organizational change. These differences can be attributed to history, culture, population, political and economic systems, and so on.

Table 2. Cultural Difference Comparison between the US and China (Farh et al., 2004)

Cultural Difference	U.S.	China
Organizational Effectiveness (Resource management in both external and internal	External: relatively more cooperative approach Internal: has effective control over resources	External: manager-oriented approach Internal: less deterministic in the acquisition, retention, and control of

aspects)		resources
Economic Environment	A highly developed legal and regulatory context for transacting business (interactions between a firm and its environment are guided by formal contracts, rule of law, and avenues of redress for violations)	The firm is vulnerable to capricious enforcement of such legal and regulatory codes
Legal and Commercial Infrastructure	A free market with its commercial ground rules in which firms compete on price and quality	Marketing transitions among firms are not completely insensitive to price due to trust inherent in personal relationships
View of Organizational Change	Individualism view: *OC is needed for the organization to remain competitive *Initiatives for change are encouraged	Collectivist view: *Escalation of conflict presents serious risks among major groups

Organizational culture in China is another topic that has been analyzed with Western theory. Tsui, Wang, and Xin (2006) conducted research about the differences in Chinese organizational culture among three different types of organizations. They indicated that, after the economic reform, the three main types of organization ownership in China were state-owned enterprises, private domestic enterprises, and foreign-invested firms. Based on organizational culture theories from Western literature, three studies were designed using a mixed method approach to measure cultural dimensions in Chinese organizations. They found a systematic relationship between these culture types and the measure of perceived firm performance. Hempel and Martinsons (2009) developed an international Organizational Change theory (OC) based on Western OC and organizational development (OD) theories of

the late 1990s by using Chinese organizations as samples. Results of their study indicated that a change of context influences not only the process of change but also the content and objectives of change.

The Applicability of Western Organizational Theories

According to Goodman and Steckler (1990), basic theories that focus on interaction between factors of the change process within organization include stage theory and organizational development theory. Brief introductions of these theories are given below.

Stage theory is based on an idea that organizational change happens through a series of steps or stages. According to Stage Theory of Organizational Change, adoption of an innovation by an organization typically follows several stages. Each stage requires a specific set of strategies contingent on the organization adopting, implementing, and sustaining new approaches as well as on socio-environmental factors that may be outside the organization's control. Goodman and Steckler (1990) explained that the foundation of the modern stage of organizational change theory is Lewin's (1951) stage model, which contains three stages of change: (1) unfreezing of past behavior and attitudes within the organization, (2) moving by exposure to new information, attitudes, and theories, and (3) refreezing through processes of reinforcement, confirmation, and support for the change. Goodman and Steckler (1990) also mentioned that Beyer and Trice (1978) developed a comprehensive and well-defined seven-stage model that Kaluzny and Hernandez (1988) then condensed into four stages, including the awareness stage, adoption stage, implementation stage, and institutionalization stage. Any innovation within an organization experiences each stage and transfers to the next

stage through certain strategies and factors. Once it reaches the institutionalization stage, the innovation is considered successfully accomplished by the organization. Strategies that each organization would use depend on their stage of change and if the innovation has a supportive social environment or not (Smith, Steckler, McCormick, & McLeroy, 1995).

Another basic area of organizational theory is Organizational Development (OD), which includes factors or strategies in the change process such as continuous diagnosis, action planning, implementation, and evaluation. The goal of Organizational Development (OD) is to transfer knowledge and skills to organizations to improve their capacity in recognizing opportunity and managing innovation (Glanz, et al., 2008). Butterfoss, Kegler, and Francisco (2008) defined OD as a study field, which mainly includes research, theory, and practice that focuses on developing the knowledge and effectiveness of an individual to achieve successful organizational change. They also found the following in their report (Butterfoss et al., 2008, p. 341):

> Howthorne's studies in the 1920s-1930s found out that the increasing of attention on workers may led to their higher motivation and productivity (Roethlisberger & Dickson, 1939). Lewin's work in 1940s-1950s observed that feedback is an effective tool to address social process in organizations. In 1960s, early OD interventions dedicated to organizational design, technologies, and human processes in order to make organizational work more satisfying and beneficial. Currently, OD has a wider focus on engaging organization with the complex environment and rapidly changing by management on organizational learning and knowledge, and transformation of organizational norms and values (Brown and Covey, 1987; Cummings, 2004).

OD programs obtain and share resources and implement actions that directly affect the quality of life for broader groups. From an ecological systems view, organizational change is also an activator for larger-scale community change and thus can impact the system as a whole (Kegler et al., 2008). Interventions in OD are usually implemented to improve organizational effectiveness, performance, and the "quality of work life," as well as to enhance the ability of organization members to solve major problems or achieve project goals or overall organizational goals (McNamara, 1997; Brown & Covey, 1987).

Greiner (1965)'s study on antecedents of planned organizational change described four stages that an organization may move through from an early "unplanned" status to a later "planned" successful change. Kotter (1995)'s study further indicated that there are eight steps for an organization to perform a comprehensive transformation or change. Fernandez and Rainey (2006) provided a literature overview on organizational change studies, and summarized eight propositions or factors that they considered as determinants that positively contribute to the successful organizational change. The Organizational Change Capacity theory (OCC) (Klarner, Probst, & Soparnot, 2007) developed a framework of organizational change capacity, including three dimensions and several themes or concepts under each dimension. The matrix below demonstrates a comparison between the three studies mentioned above. The OCC theory is applied in this study as a foundation in designing data collection methods and establishing Chinese Change Capacity framework.

Organizational change theory matrix

Antecedents of planned organizational change (Greiner, 2007)	Leading change: why transformation efforts fail (Kotter, 1995)	Managing Successful Organizational Change in the Public Sector (Fernandez and Rainey, 2006)	From change management to the management of organizational change capacity: A conceptual approach (Klarner, Probst, & Soparnot, 2007)
Proposition 1: Arousal and search stage Proposition 2: Recognition and decision stage Proposition 3: Re-education stage Proposition 4: Reinforcement stage	Step1: Establishing a sense of urgency Step2: Forming a powerful guiding coalition Step3: Creating a vision Step4: Communicating the vision Step 5: Empowering others to act on the vision Step6: Planning for and creating short-term wins Step7: Consolidating improvements and producing still more change Step8: Institutionalizing New Approach	Factor 1: Ensure the need Factor 2: Provide a plan Factor 3: Build Internal Support for Change and Overcome Resistance Factor 4: Ensure Top-Management Support and Commitment Factor 5: Build External Support Factor 6: Provide Resources Factor 7: Institutionalize Change Factor 8: Pursue Comprehensive Change	Change Process Dimension: -Transformational leadership -Incremental deployment -Collectively built change processes -Creation of transparency -The perceived legitimacy of the change Organizational Context Dimension: -The value of change -Structural Flexibility -Cultural cohesion -Trust -Practices based on consensus -Capabilities of individual learning Learning Dimension: -Improvement through experience -Renewal through experimentation -Transfer of organizational knowledge

Organizational Change Capacity theory (OCC) is one of the major theories in the OD field that provides a valuable framework to help measure the change capacity of an organization and predict innovation performance. This theory is explained comprehensively in the next section.

Organizational Change Capacity Theory and its Application

Organizational Change Capacity theory has been chosen to apply to Chinese public health organizations in the present study. Although organizational theories such as stage of change theory provide credible theoretical evidence for researchers to design organizational practices, studies have still indicated that nearly 70 percent of planned organizational change activities fail due to a lack of reliable and valid methods to assess and analyze organizational capacity of change (Judge, 2009).

As Kahn (1974) pointed out, there is a lack of continuity in the systematically defined constructs and a conceptual framework for OD. An analysis of an organization's change capacity allows organizational change proponent to better deal with the determinants of change capacity, which in turn increases adaptation and survival (Klarner, Probst, & Soparnot, 2008). Organizational change capacity has only recently received in-depth attention in the literature. Although the construct has often been mentioned in the organizational change and development literature (Carnall, 2003; Greenwood & Hinings, 1996; Nadler & Tushman, 1989), it has seldom been defined or described.

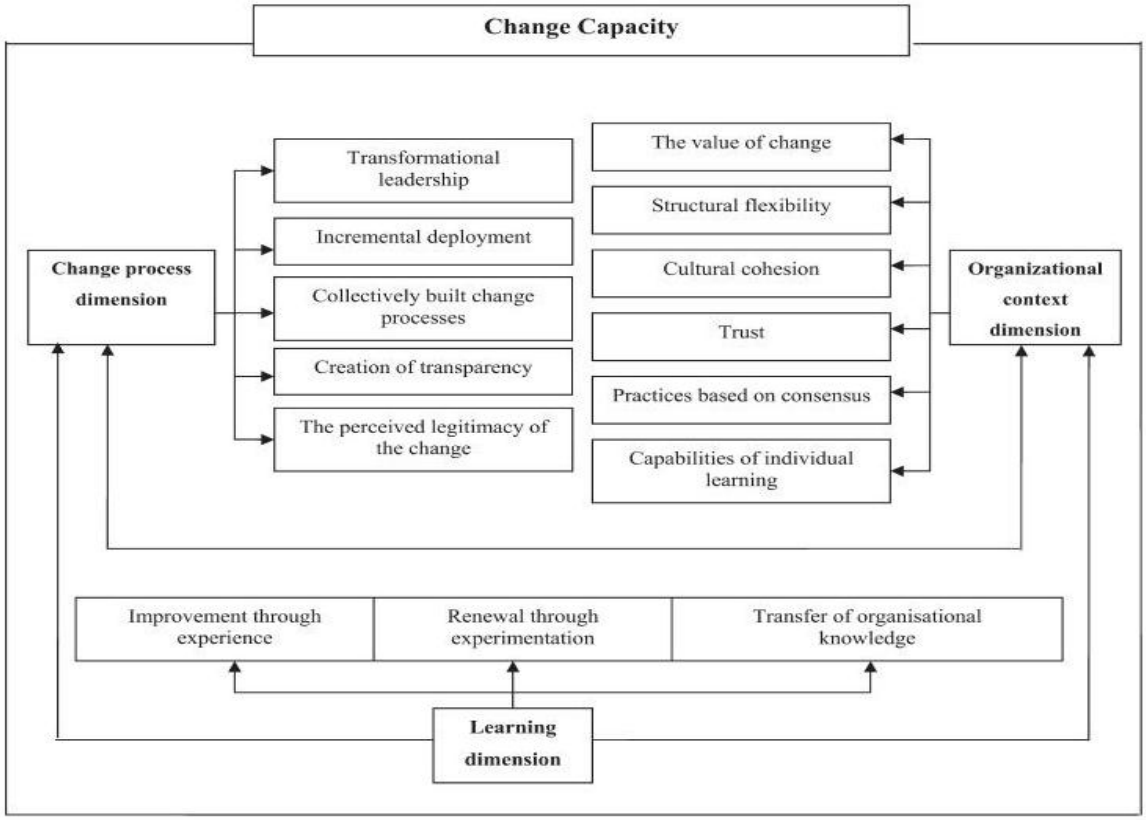
Judge and Elenkov's (2005) study defined organizational change capacity as "a broad and dynamic organizational capability that allows the enterprise to adapt old capabilities to new threats and opportunities as well as create new capabilities" (p. 894). Meyer and Stensaker (2006) adopted a process perspective of change capacity. They defined capacity for change as "the allocation and development of change and operational capabilities that sustains long-term performance" (p. 1). These different definitions provide similar meaning of organizational change capacity with various perspectives.

Klarner et al. (2007) developed a framework of organizational change capacity (OCC) based on literature study, which includes three dimensions: context dimension, change process dimension, and learning dimension (Figure 2). Under each dimension, there are several components that determine the capacity of change. In Table 3, definitions of each concept in the model are provided. By using this model of OCC, researchers will be able to analyze the capacity of change in certain organization and estimate the possibility of a successful innovation.

According to SEM, organizational level is in the middle of the ecological framework. Individual and interpersonal levels are under the organizational level, while community and public policy levels are above it. As stated above, the OCC framework indicates the function of change capacity at the organizational level. However, this OCC model does not limit itself to the middle level. Most of its concepts are closely related to ecological levels both above and below the organizational stage. For example, transformational leadership (change process dimension), capabilities of individual learning (organizational context dimension), and trust (organizational context dimension) represent individual abilities and interpersonal

relationships, while culture cohesion (organizational context dimension) and perceived legitimacy of change (change process dimension) represent community value and sensitivity of public policy. Moreover, by adopting the OCC framework into organizational development, organizations may achieve more successful innovations, thus promoting productive community work.

Figure 2. Organizational change capacity model



Adapted from Klarner, P., Probst, G., & Soparnot, R. (2008). Organizational change capacity in public services: The case of the World Health Organization. *Journal of Change Management*, *8*(1), 59.

Table 3. Concepts in OCC model

Concept	Conceptual Definition	Operational Definition
Context Dimension	Describe the conditions that facilitate changes	
The value of change	Shared organizational representations of change	Employees' shared beliefs in the importance of change, which governs their support for change as well as their behavior with regard to decisions to initiate and implement changes
Structural flexibility	An "organic" organizational structure	Facilitates employees' discussions of the change's stakes, which leads to better solutions to change problems and an increased understanding of the change process
Cultural cohesion	A common and strong organizational culture	Open-ended questions can be provided to staff to measure cultural cohesion
Trust	The relationship between a change promoter and the actors involved in the change initiative	Open-ended questions and interview can be provided to promoter and actors measure the relationship.
Practices based on consensus	Collective problem solving practices	Employees' participation, initiative, and learning during the change process
Capabilities of individual learning	An individual's ability to learn during change process	The actor's ability to learn new ways of thinking and operating, and their ability to cope with different organizational change
Process Dimension	Implementation of changes	
Transformational leadership	The ability to convince powerful people within the organization of a change initiative's importance and to listen to employees and actively support	Interviews and open-ended questions can be provided to employees, especially the powerful people, to measure

	their discussions of the change	the abilities of the leader
The perceived legitimacy of the change	The way of the change promoters' commitment to justify the change	The promoters' commitment to change, the persistence of their actions during the change process, and the resources that top management contributes to the change initiative
Collectively built change processes	Negotiation and discussions between all organizational members, as well as through collective problem-solving and learning	Interviews can be provided to all organizational members to measure level of negotiation and discussions between them
Incremental deployment	A "step-by-step" change process	Open-ended questions can be provided to measure progress that they made in each step
Creation of visibility	An open and continuous communication of the change process, its stakes, outcomes, and the actions undertaken	Interviews can be provided to all organizational members to measure level of communication during the change process
Learning Dimension	The organizational ability to continuously investigate its practices to improve and renew them	
Improvements through experience	Employees learn from each change initiative	Inductive approach of qualitative research allows determinants of learning dimension to reveal themselves
Renewal through experimentation	The renewal of an organization's collective memory	
Transfer of organizational knowledge	Making information sufficiently available during organizational change process	

Klarner et al.'s (2007) assessed to OCC model first in their research in the following year to analyze the change capacity of the World Health Organization (WHO) (Klarner et al., 2008). The researchers used a qualitative method to collect data for each component in the

framework to see if the organization had the capacity of change at that time. The findings revealed that the WHO was lacking important determinants of all three dimensions that could have decisively enhanced its change capacity. This result was consistent with the failure of change that happened in the WHO during the same period.

Summary

This literature review presents four main themes: the current situation of public health status in both U.S. and China and the importance of learning from each other in public health development, applications of organizational theory in China, the applicability of Western organizational theories, and the rationale of choosing Organizational Change Capacity theory to apply to China in the present study. Recruitment and data collection methods of this study will be described in the next chapter. These themes provide (a) a general idea of background information to the audience of this report, (b) a systematic theoretical foundation for this study, and (c) a convincing rationale of research design for this study.

Chapter 3: Method

Introduction

The previous chapters focused on the relevance of this study to examining the applicability of the Western theory of Organizational Change Capacity theory (OCC) to Chinese organizations that have already achieved success or failed at implementing organizational change efforts. This chapter details the research methods, including study design, main strategies, and rationale.

Research Design

To understand how OCC theory may be applicable in China, the following questions are applied to orient and guide the research:

- Is the OCC theory applicable in Chinese public health organizations?
- How should the OCC framework be modified to best fit Chinese public health organizations?

The assumption underlying this research is that when an organization has high change capacity according to the OCC framework, the organization has greater receptivity to innovations in community public health.

Considering the generative characteristics of this study, a qualitative design is most appropriate. According to Creswell (2009), the main characteristics of a qualitative research design are exploring and understanding the nature of a problem. This research is exploratory in that it examines which elements from the OCC framework seem most relevant in orienting

the organization toward innovative community public health programming and in developing new elements in Chinese health organizations.

Rationale for the Methodological Approach

Grounded theory is a qualitative research method, which generate theory or framework from the research data. It is a design of inquiry for researchers to develop a general and abstract theory of a certain process, action, or relationship that grounded from the views of participants (Creswell, 2009). Grounded theory is chosen to derive a general theory of organizational change capacity for Chinese health organizations based on the OCC framework. The reason why it is chosen in this study is because this study is an exploratory research, which develops a unique organizational change capacity framework for public health organizations in China, based on the Western Organizational Change Capacity theory (OCC). The goal of this grounded theory study is not only to uncover unique conditions of organizational change in China, but also to determine how participants under observation in Chinese organizations actively respond to those conditions and to the consequences of their organizational behavior. Therefore, when questions about their organizations' specific change(s) are asked, managers, employees, and others are free to speak of experiences that indicate what factors seem important during the change process. When the participants are asked about how they have adjusted to these changes, they are free to tell stories about their experiences and perceptions of the organizational change and to explain how they would impact receptivity to community public health initiatives that are prevalent in Western countries. Grounded theory is consistent with the overall design of this study, and it is also a

popular research approach embraced by researchers in anthropology, sociology, health care, and many other fields (Bowen, 2008). Grounded theory has been described as a powerful research method that can produce a theory inductively through systematic data collection and analysis (Walker & Myrick, 2006).

Methods

This section includes the sample selection strategies and the data management approaches for use in this study. The following sections outline the details of each method. Rationale of each step is also provided below.

Sample Selection Strategies

Sample Size

In a qualitative research design, the central importance is selecting information-rich cases for in-depth study, which is why a purposive sampling strategy is more appropriate than the random selection that is commonly associated with quantitative research (Patton, 1987). Several main approaches under the concept of purposive sampling are adopted in this study. Patton (1987) indicates that extreme case sampling can be used when the study tends to improve typical programs by studying outstanding successes or notable failures. Therefore, Chinese public health organizations that succeeded or failed/challenged at implementing their own specific organizational change during health reform are both selected. Another sampling method described by Patton (1987) is maximum variation sampling, which aims to capture the main themes from a great deal of participant variation. Therefore, three different types of health-related organizations are selected in this study, including hospitals, community health

centers, and local government agencies. Further, various levels of people are recruited within each organization. Steckler, Dawson, Goodman, and Epstein (1987) introduced a framework from previous research about health organizations' structures, indicating that the function of health agencies relied on various levels, including administrators, core staff, program staff, and the relevant public individuals. Based on this framework, four levels of participants are included in each Chinese health organization, including senior leaders, mid-level managers, employees (program staff), and partners or clients outside the organizations.

Pattern (1987) also mentioned a sampling strategy called convenience sampling, which is doing what is fast and convenient. Beijing and Xi'an are two major cities that allow the researcher both the access and the political power necessary to conduct this study. Thus, participating organizations were selected from these two cities.

As shown in Table 4, in-depth interview and/or focus group data and document observation data were collected from the twelve organizations recruited to be in this study. Each of these organizations experienced a certain change during Chinese health reform, such as management committee reform, medical insurance reform, and family doctor team service reform. Participants in these organizations included leaders on different levels (president, divisional manager, group leader); relevant employees during the change; and relevant individuals outside the organizations. Details of data collection strategies are provided in a separate section below.

Table 4. Major Participants in Chinese Public Health Organizations

City/Type	Beijing (Succeeded)	Beijing (Challenged)	Xi'an (Succeeded)	Xi'an (Challenged)
Government Agencies	Senior leader (1)	Senior leader (1)	Senior leader (1)	Senior leader (1)
	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)
	Employees (2)	Employees (2)	Employees (2)	Employees (2)
	Partner/client (1)	Partner/client (1)	Partner/client (1)	Partner/client (1)
Hospitals	Senior leader (1)	Senior leader (1)	Senior leader (1)	Senior leader (1)
	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)
	Employees (2)	Employees (2)	Employees (2)	Employees (2)
	Partner/client (1)	Partner/client (1)	Partner/client (1)	Partner/client (1)
Local government agencies	Senior leader (1)	Senior leader (1)	Senior leader (1)	Senior leader (1)
	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)	Mid-level managers (2)
	Employees (2)	Employees (2)	Employees (2)	Employees (2)
	Partner/client (1)	Partner/client (1)	Partner/client (1)	Partner/client (1)

This study covers a range of different Chinese organizations to acquire a comprehensive understanding of unique characteristics in Chinese organizational change.

An essential question is what represents an organization that experienced innovation. Three general standards were set to determine the participative organizations, including systematization, comparability, and accessibility. First, a well-organized system ensures the

data collected in this study cover every aspect of the research questions. This way, concepts that already exist in the OCC framework and elements that newly emerge in the study process can both be addressed through data collected from each level of the participants in the organization. Second, organizations that experienced successful and unsuccessful change have both been selected for this research. Essential elements that greatly affect the change capacity of an organization can be found by comparing the similarities and differences of responses between the successfully changed organizations and the challenged-to-change organizations.

A professional panel was formed to determine whether the changes of pre-selecting organizations were successful or not. Members of this panel included managers of Chinese public health agencies, academic experts in organizational change and public health, main policy makers in this field, and policy analysts. Third, the researcher gave priority to organizations that were easier to access both geographically and in terms of social network connections.

Recruitment

A five-stage recruitment strategy was applied to motivate participation by Chinese organizations that fit into the requirement of this study. This strategy was inspired by Goodman, Smith, Dawson, and Steckler (1991)'s study, which included stages of homework (background information, contact information), priming the pump (intermediary and superintendent), making contact (team member calls superintendent to arrange meetings), holding the summit (meet and obtain a liaison), and establishing a follow-up (send letter, call liaison, establish timeline for a recruitment decision). Because this five-stage strategy is

suitable for long-term community programs, it was not necessary to apply all five steps in the current study. However, the first three stages proved very useful in recruiting leaders, employees, and other relevant individuals outside the participating Chinese public health organizations. Background information was collected before selecting a mediator in each organization. The mediators are people that have close social relationships with major managers in selected organizations. They are either inside or outside those organizations. The researcher made contact with the organizations through the mediators and made sure that the preparation process was on track. Emails and letters about this study were sent to all possible participants in the organizations. Determinations about study participants were made after a careful review of email and letter responses. The study investigator, Xueyin Zhao, made direct contact with the study participants.

Data Management Strategies

Data Collection

According to Corbin and Strauss (1990), the founders of grounded theory, the data for the research design can come from various sources, such as government documents, videotapes, newspapers, letters, books, and anything that could contribute to the area of the study questions. In this study, some of the possible sources mentioned above are included in the data collection process.

All data collected in this study were confidential and were approved by the Indiana University Institutional Review Board. The first step was to collect interview data from leaders, clients/partners, and focus group discussion among middle level managers and

employees. The interviews and focus groups were one-on-one and face-to-face. Two in-depth interviews were conducted in each organization, including one leader's interview and one partner/client's interview. One focus group interview was conducted in each organization, including two mid-level managers and two employees. Each interview or focus group took about 60 minutes, depending on responses of the participants. The researcher controlled the time by using communication skills. The second step was to collect organizational documents, including government documents, videotapes, newspapers, letters, and books. The document collection in each organization took one day and took place in the organization. All original documents were returned two days after the data collection process. The final step was the pre-interview questionnaire collection to determine convergent validity by asking similar questions. Questions were determined by participants' responses during the first two steps and the OCC framework. Detailed data collection procedure, including interview/ focus group sample questions and questionnaire sample, are provided in Appendix A: data management protocol, and Appendix B: Questionnaire sample.

Data Analysis

The interview and follow-up questionnaire data were collected in Mandarin Chinese, then translated and analyzed by the study investigator Xueyin Zhao. A grounded theory qualitative approach was applied in the analysis. Documents collected from the participating organizations were analyzed by this approach to understand and illustrate the data. A grounded theory analytic approach takes a line-by-line open-coding analysis and constantly compares the data, searching for themes or categories. This strategy was used to analyze data

collected from Chinese health organizations to make generalizations about OCC elements that affect organizational change capacity. Open coding breaks the data down to help the analyst gain fresh insights into the study design.

An inductive approach was also applied during the data analysis process to create possible new elements that could be added into the OCC model to fit Chinese society. The inductive approach starts with the data and develops categories from the raw data. This process creates as many categories as can fit successive, separate incidents, all while coding into as many groups as possible. New groups emerge, and new factors fit into existing groups.

Data analysis in a grounded theory design research begins right after the interview/focus group data are collected. Analysis from this step is necessary here because it directs the next pro-interview close-ended questionnaire. As stated in the data collection section, the analysis process began after the collection of interview/focus group data. The second analysis could not start until the researcher successfully collected questionnaire data from study participants. This way, data from each organization was analyzed equally. Analysis of documents occurred at the same time.

This study used qualitative comparative analysis (QCA) to make sure the resulting concepts were compared with each other, grouped, and then built into the theory. QCA is designed for analyzing data sets by listing and counting all the combinations of variables observed in the data set and then for applying the rules of logical inference to determine which descriptive inferences or implications the data support (Ragin, 1987). In the case of this study, QCA begins by listing and counting all types of key words (phrases) that occur,

where each type of word is defined by its unique combination of values in the OCC model. By counting the number of observations that exist, QCA can determine which descriptive inferences or implications are empirically supported by a data set.

Comparison within and across different cities (Beijing, Xi'an), levels of participants, degrees of success (successfully changed, unsuccessfully changed), and types of organizations were analyzed to attain a better understanding of Chinese public health organizational change during health reform.

During the data analysis process, some elements within the OCC framework developed by Klarners et al. (2007) were still valid among Chinese public health organizations. These elements were kept as components of the organizational change capacity framework to Chinese organizations. New elements emerged at the same time. These elements are directly emerged from China and are suitable to Chinese public health organizations. The framework was developed with a combination of the two groups of elements described above. Chapter 4 will include a more in-depth discussion of these elements.

Chapter 4: Study Results

Summary

The Methods Chapter (Chapter 3) states the two study questions that guide the present research:

- Is the OCC theory applicable in Chinese public health organizations?
- How should the OCC framework be modified to better fit Chinese public health organizations?

The assumption underlying this research is that when an organization has high change capacity according to the OCC framework, the organization has greater receptivity to innovations in community public health. Chapter 3 describes the methods that inform these questions, which include the development of a panel of experts to determine whether the organizational sites were successful in their desired organizational change or if they were challenged in producing change. The chapter also discusses the two methods of data collection: interviews and a follow-up questionnaire. The two methods are designed to explore how well the resulting data converge across methods to bolster a case for construct validity in redesigning the organizational change theory introduced in Chapter 2 and improve its applicability to Chinese health organizations.

In Chapter 4, the results of the data collection are presented. First, an analysis is provided which indicates that the determinations made by the panel of experts appear valid, thus supporting a comparison of the data between both successful and challenged organizations. Second, the data for the number of interviews conducted and questionnaires returned are

provided, followed by a presentation of the themes that emerged from the qualitative interview data and that were further confirmed by the questionnaire data. After the themes are presented, the original organizational change theory model is redrawn based on the findings. This chapter ends with a discussion of the findings' relevance to the two research questions posed, the implications of the findings for Chinese health organizations, and potential areas for future research based on the dissertation findings.

Preliminary Analysis

Analysis 1. Justification of validity in splitting the organizations

A. Preliminary analysis of the interview data by organizational status

To assure the validity of the expert panel's selection of successful and challenged sites, the numbers of positive and negative responses were coded and counted by site and by respondent group. Responses that describe strength and advantages that help the organization to achieve successful change are considered positive responses. On the contrary, responses that describe weakness and disadvantages that obstruct the organizational change in participating organizations are considered negative responses. The assumption is that successfully changed organizations should rank higher in positive responses and lower in negative responses compared to the challenged organizations. A chi-square test also is applied to the number of positive responses and negative responses to bolster the validity of the panel's designation of organizations as successful or challenged.

Table 5 provides a key for the type and location of each organization in the study and includes the panel designation of a site as successful or challenged. The abbreviations in

Table 5 are used in Table 6, which displays site rankings by the number of positive responses, as well as in Table 7, which contains site rankings by the number of negative responses from interviews within each participating organization. The three tables indicate that:

1) Across the 12 participating organizations, the six organizations that supplied the most positive responses were the six organizations deemed successfully changed sites during reform by the panel (site 1 with 81 positive responses, site 2 with 69 positive responses, site 3 with 68 positive responses, site 4 with 67 positive responses, site 5 with 57 positive responses, and site 6 with 73 positive responses; see Table 6).
2) Across the 12 participating organizations, the six organizations that supplied the most negative responses were the six organizations determined by the professional panel as challenged in change during reform (site 7 with 39 negative responses, site 8 with 42 negative responses, site 9 with 40 negative responses, site 10 with 44 negative responses, site 11 with 44 negative responses, and site 12 with 43 negative responses; see Table7).
3) According to the Chi-square test (see Table 8), the distribution between positive responses and negative responses across 12 organizations is strong ($\alpha=.05$, $P<.05$).

In conclusion, the separation of the 12 organizations into successful and challenged sites by the professional panel appears valid.

Table 5. Case Number Key

	Beijing (B)		Xi'an (X)	
	Rural area (R)	Urban area (U)	Rural area (R)	Urban area (U)
Government Agency (G)	1 BRG (Successful)	8 BUG (Challenged)	4 XRG (Successful)	11 XUG (Challenged)
Public Hospital (H)	3 BRH (Successful)	9 BUH (Challenged)	5 XRH (Successful)	10 XUH (Challenged)
Community Health Center (C)	7 BRC (Challenged)	2 BUC (Successful)	12 XRC (Challenged)	6 XUC (Successful)

*Cases 1-6 are successfully changed organizations (according to the professional panel assessment)

*Cases 7-12 are challenged organizations (according to the professional panel assessment)

Table 6. Illustration of Data: Positive Response Rank

Rank by positive response	Case number	Positive response number	Negative response number
1	1 (BRG)	81	6
2	6 (XUC)	73	6
3	2 (BUC)	69	8
4	3 (BRH)	68	10
5	4 (XRG)	67	5
6	5 (XRH)	57	11
7	8 (BUG)	31	42
8	7 (BRC)	30	39
9	9 (BUH)	30	40
10	12 (XRC)	26	43
11	10 (RUH)	25	44
12	11 (XUG)	17	44

Table 7. Illustration of Data: Negative Responses Rank

Rank by Negative response	Case number	Positive response number	Negative response number
1	10	25	44
2	11	17	44
3	12	26	43
4	8	31	42
5	9	30	40
6	7	30	39
7	5	57	11
8	3	68	10
9	2	69	8
10	1	81	6
11	6	73	6
12	4	67	5

Table 8. Illustration of Data: Chi-square Analysis

Statistical	Rank by positive	Case#	Positive #	Negative #	Grand total
	1	1	9.8343	18.9425	28.7767
	2	6	8.4785	16.3312	24.8097
	3	2	6.6175	12.7464	19.3638
	4	3	5.4032	10.4075	15.8106
	5	4	8.1101	15.6215	23.7317
	6	5	3.3462	6.4454	9.7916
	7	8	6.0516	11.6565	17.7081
	8	7	5.2349	10.0833	15.3182
	9	9	5.6101	10.8060	16.4161
	10	12	8.3031	15.9933	24.2964
	11	10	9.1803	17.6828	26.8631
	12	11	13.3510	25.7164	39.0674
Grand total			89.5208	172.4327	261.9535

Critical value	24.72497031	*
P Value	0.00	*

B. Validity of categorizing organizations base on the follow-up questionnaire analysis

The follow-up questionnaire is designed with a four-level scale. Each question in the questionnaire has four-level of responses, including maximum extent, moderate extent,

minimum extent, and not at all. In order to maintain the consistency of analysis for both the interview and the questionnaire, which is to compare the difference between positive responses and negative responses, the Chi-square test method is applied to analyze the questionnaire data. In order to do so, the four-level responses are split in half from the middle point. Pelto and Pelto (1978) stated in their book that any series of values in an ordinal scale could be lumped together as one group and another. Thus, in this study, maximum and moderate extent responses are considered as positive responses, while minimum and none extent are considered as negative responses. Table 9 illustrates that the follow-up questionnaire results also indicate that the successfully changed organizations provide more positive responses and fewer negative responses, compared to the challenged organizations. A Chi-square test of the questionnaire data further supports the relationship stated above as significant: X^2 (1, N = 2016) = 480, p <. 01.

Table 9. Positive and Negative Responses in the Two Levels of Organizations

Overall	Successful	Challenged	Total
Positive response	1022	536	1558
Negative response	34	424	458
Total response	1056	960	2016

The above analysis of interview and follow-up questionnaire data are consistent and therefore support the expert panel's categorizations of the organizations as valid. Such a determination allows for the analysis to proceed in distinguishing how OCC may be applied to Chinese public health organizations. As described in Chapter 3, the data that are presented below are analyzed by comparing how respondent perspectives are similar within successful

and within challenged organizations on questions regarding the OCC framework, and how they differ across these two organizational categories.

The data from interviews were collected from 72 participants across 12 Chinese public health organizations in the cities of Xi'an and Beijing. Thus, the organization recruitment plan presented in Chapter 3 was implemented successfully. Similarly, the questionnaire data to be analyzed for convergent validity with the interview data resulted in 63 respondents (of 72 interview participants) for a response rate of 87.5 percent, including 12 leaders (100 percent of total number of leaders in interview), 44 mid-managers/members (of 48 interview participants, 91.7 percent of total number), and seven patients/partners (of 12 interview participants, 58 percent of total number).

Recall that the questionnaire was developed once the initial data analysis of the interviews was completed and was then used to construct the questions. This process produced 32 multiple-choice questions (see Appendix B for the questionnaire sample). The results of the interview and questionnaire data are followed by a comparison of the two methods across each finding to address convergent validity.

Analysis 2. Development of themes that emerged from the interview data

In Chapter 3, the nature of the data analysis process was described. Briefly, taxonomies were developed for each interview site based on the interview data. Subsequently, a comparison was made in exploring the similarities of taxonomies between the successful organizations and the challenged organizations, resulting in a comprehensive taxonomy for the successful sites and a second comprehensive taxonomy for the challenged sites. Comparisons were further made across the two emerging taxonomies to identify differences

that may be critical in distinguishing successful sites from challenged sites. In initiating the analysis, the data were coded for items that would be considered positive in contributing to the desired organizational change and items considered negative or as hindering organizational change. See Appendix C: Interview taxonomy for complete rough interview data.

The main themes and sub-themes that emerge from interviews with participating members of the 12 organizations appear in Tables 10-13. The main themes are as follows: transformational leadership, implementation strategy, communication, member's positive character, member's consensus on change, member's improvement during change, cooperation with external parties, member's skills, trust, relationship-building with clients, empowerment, upper-level supports, and practices in overcoming difficulties.

Table 10 illustrates positive themes and categories from the six successfully changed organizations. The total numbers in the right-hand part of the table (in blue) indicate how many responses a theme or category received in interviews across the six sites. Themes with more than 20 comments are considered the most meaningful and representative in this study, and these themes include the importance for successful organizational change on the qualities of transformational leadership (127 responses), implementation strategy (95 responses), communication (36 responses), member's positive character (34 responses), member's consensus on change (27 responses), member's improvement during change (25 responses), and cooperation with external party (21 responses). The six other themes were mentioned relatively less than the main themes listed above. However they may be meaningful for future

study and research in Chinese organizational change and, therefore, are also listed in Table 10.

Table 10. Positive Comments in Six Successfully Changed Organizations

Theme	**Category**	**Total**	
Transformational Leadership	Leader's positive character	**36**	**127**
	Leader's awareness	**27**	
	Leader's communication	**16**	
	Leader's ability	**15**	
	Leader's implementation strategy	**14**	
	Leader's self-improvement during change	**11**	
	Leader's positive experience	**5**	
	Leader's positive practice during change	**3**	
Implementation Strategy	Structural improvement	**14**	**95**
	Preparation of change	**11**	
	Service improvement	**11**	
	Culture and rule improvement	**9**	
	Training opportunity	**8**	
	Construction improvement	**8**	
	Evaluation and supervision during the change	**5**	
	Target shifting during change	**4**	
	Publicity of change	**4**	
	Technical improvement strategy	**4**	
	Task distribution	**3**	
	Resource inputs	**3**	
	Regular meetings during the change	**3**	
	Investigation to partners	**2**	
	Internal system change	**2**	
	Motivation	**2**	
	Informationization	**1**	
	Communication with upper-level government during change	**1**	
Communication	Communication between members	**27**	**36**
	Communication with partners	**6**	
	Communication with external parties	**3**	
Member’s positive character	Characters that promote efficient work	**25**	**34**
	Solidarity among members	**6**	
	Member's previous experience	**3**	
Member’s consensus on change	Member's understanding of change value	**18**	**27**
	Consensus on change implementation	**6**	

	Practices to reach value consensus	**3**	
Member's improvement during change		**25**	**25**
Cooperation with external parties	Work cooperation through the change	**12**	**21**
	Relationship building with partners	**6**	
	Partner's consensus on change value	**3**	
Member's skills		**14**	**14**
Trust	Trust among members	**8**	**14**
	Trust in leader	**3**	
	Trust with partners	**3**	
Relationship-building with clients		**10**	**10**
Empowerment	Empowerment to committee	**1**	**4**
	Empowerment to partners	**1**	
	Empowerment to other parties	**2**	
Upper-level supports	Policy support	**2**	**4**
	Change strategy support	**2**	
Practices in overcoming difficulties		**3**	**3**
Total			**414**

Table 11 illustrates negative themes and categories from the six successfully changed organizations. In this table, the only one main theme with more than 20 comments is Government Issue that obstructs organizational change (20 responses).

Table 11. Negative Comments in Six Successfully Changed Organizations

Theme	**Category**	**Total**	
Government issue that obstructs the change	Empowerment issue	**9**	**20**
	Lack of government support	**7**	
	Upper-government limitation	**4**	
Lack of member's support	Disagreement about internal system	**3**	**8**
	Disagreement about change	**2**	
	Dissatisfaction in increasing working load	**2**	
	Lack of participation	**1**	
Inadequate communication	Inadequate communication with members	**6**	**7**
	Inadequate communication with members	**1**	
Financial limitation		**4**	**4**
Conflicts between members	Conflicts with patient	**2**	**3**
	Conflicts in self-profit	**1**	
External barriers	Regional limitation	**1**	**3**

	Partner site limitation	**1**	
	Information inconsistency	**1**	
Internal system problem	Difficulties in structure change	**1**	**2**
	Difficulties related to management system	**1**	
Total			**47**

In comparing Tables 10 and 11, interviewees from the successful organizations report relatively more positive responses than negative ones. The amount of positive feedback (Table 10, 414 responses) is much higher than the amount of negative feedback (Table 11, 47 responses). As a result, most of the positive themes emerged from the successful organizations have a number of sub-categories, while most of the negative themes have much less complexity. The following analysis of the challenged organizations indicates a pattern that is the reverse of that of the successful organizations.

Table 12 illustrates positive themes and categories from the six challenged organizations. Again, themes with more than 20 comments are considered most meaningful and representative in this study, which include change advantage in leadership (47 responses), member's advantage in promoting the change (22 responses), and positive strategies of change (21 responses).

Table 12. Positive Comments in Six Challenged Organizations

Theme	**Category**	**Total**	
Change advantage in leadership	Leader's positive character	**15**	**47**
	Leader's awareness of change	**13**	
	Leader's ability	**9**	
	Leader's self-improving	**8**	
	Leader's positive experience	**2**	
Member's advantage in promoting the change	Member's positive character	**10**	**22**
	Member's awareness of change	**6**	
	Member's skills	**4**	
	Member's consensus on change value	**2**	
Positive strategies of change	Service improvement	**10**	**21**
	Internal system change	**3**	

	Training opportunity	**2**	
	Clear deployment	**1**	
	Culture building	**1**	
	Structure improvement	**1**	
	Rules and culture improvement	**1**	
	Evaluation to members	**1**	
	Clear task deployment	**1**	
Member's self-learning		**16**	**16**
Cooperation with external sites	Relationship building with external sites	**8**	**15**
	Work cooperation through the change	**7**	
Trust	Trust between members	**9**	**14**
	Trust with leader	**3**	
	Trust with clients	**1**	
	Trust with external sites	**1**	
Communication	Communication among members	**13**	**14**
	Communication with clients	**1**	
Relationship-building with clients		**6**	**6**
Successful organizational reform		**2**	**2**
Upper-level government support		**2**	**2**
Adequate medical resources		**1**	**1**
Total			**160**

Table 13 illustrates negative themes and categories from the six challenged organizations. Main themes here, with more than 20 comments, include leader's limitation (46 responses), Government Issue that obstructs the change (39 responses), lack of communication and transparency (28), internal system limitation (26 responses), member's self-limitation (25 responses), and lack of member's support (24 responses).

Table 13. Negative Comments in Six Challenged Organizations

Theme	**Category**	**Total**	
Leader's limitation	Leader's lack of abilities	**22**	**46**
	Leader's negative character	**10**	
	Leader's lack of awareness about change	**9**	
	Leader's lack of communication with upper government	**5**	
Government issues that obstruct the change	Lack of government support	**16**	**39**
	Upper-government limitation	**15**	
	Empowerment issue	**8**	
Lack of communication and transparency	Lack of communication with members	**26**	**28**
	Lack of communication with clients	**2**	
Internal system limitation	Structure system issue	**9**	**26**
	Personnel system issue	**9**	
	Appraisal system issue	**5**	
	Low medical service quality	**2**	
	Unsatisfied working environment	**1**	
Member's self-limitation	Lack of skills	**10**	**25**
	Member's negative character	**10**	
	Member's unawareness of change	**5**	
Lack of member's support	Member's disagreement on change value	**15**	**24**
	Lack of motivation	**5**	
	Dissatisfaction in increasing working load	**2**	
	Member's disagreement on change Implementation	**1**	
	Member's disagreement on work value	**1**	
Implementation process issue	Ineffective Implementation methods	**8**	**18**
	Lack of change implementation plan	**5**	
	Lack of implementation power	**3**	
	Lack of training	**2**	
Lack of resources	Lack of human power	**5**	**12**
	Lack of authority	**2**	
	Lack of equipment	**2**	
	Lack of policy supports	**2**	
	Lack of technical improvement	**1**	
External barrier	Patient issue	**11**	**12**
	Decreasing number of new graduates	**1**	
Resident's lack of acceptance		**7**	**7**

Distrust relationship with clients		**6**	**6**
Financial difficulties		**5**	**5**
Top-down communication style		**3**	**3**
Total			**251**

In summary, Tables 12 and 13 reflect that interviewees from the challenged organizations report relatively more negative responses (251 responses) than positive ones (160 responses). As a result, most of the negative themes emerged from the challenged organizations are layered with more detailed categories, while most of the positive themes have much less complexity.

A comparison of themes emerged from successful organizations and challenged organizations indicates that the number of positive comments in the successfully changed organizations (Table 10, 414 responses) are much higher than in the challenged organizations (Table 12, 160 responses), while the negative comments in the successfully changed organizations (Table 11, 47 responses) are much fewer in number than in the challenged organizations (Table 13, 251 responses). Thus, the validity of splitting the organizations based on the professional panel is again justified. Results of analysis for each main theme will be discussed later in the next section.

Major Findings

Based upon a pre-established criterion for inclusion in this study, organizational change themes emerged from the interview data. Themes with more than 20 responses in each table

in analysis presented above (see Tables10-13) were considered main themes, and therefore, they have become the focus of this study.

Some of the themes from different types of organization (successfully changed, challenged) or different direction (positive way, negative way) have similar meanings. Similar themes were combined into one to make them clearer and more parsimonious. For example, transformational leadership theme in the successful organizations, change advantage in leadership theme in the challenged organizations, and leader's limitation theme in the challenged organizations are combined together into one main theme in the major finding, transformational leadership.

After the combination, nine main themes were selected as the main themes in this study of organizational change capacity in Chinese public health organizations: *transformational leadership*, *implementation strategy*, *member's positive character*, *communication and transparency*, *government support*, *member's consensus on change*, *healthy internal system*, *member's self-improvement during the change*, and *cooperation with external parties during the change.* These main themes are described individually below. During analysis of the data, sub-categories were summarized first from the interviews to form main themes. These sub-categories are introduced after description of each theme with number of responding site and types of respondent. In the analysis below, sub-categories with more than three comments are counted as valid and listed under each main theme.

A unique finding about transformational leadership theme is also listed below. This finding indicates that leaders in Chinese public health organizations always reported positive perceptions on their overall leadership capacity, no matter if they are in the successfully

changed organizations or the challenged organizations, while other participant groups responded in different way.

In order to achieve convergent validity, both qualitative interview data and quantitative follow-up questionnaire data are analyzed under each theme below. The questionnaire data analysis applies both Yates Correction test and T-test methods. With these multiple analysis methods combined together, the conclusion validity of this study is comprehensively reached.

1. ***Transformational leadership is an important capacity for a Chinese public health organization to succeed in organizational change.***

The first theme, *transformational leadership*, describes certain pivotal characteristics of leadership that are advantages in conducting successful organizational change, including the ability to convince powerful people within the organization of a change initiative's importance, listening to employees, and actively supporting their discussions of the change.

Transformational leadership is the most important theme in this study. Its interview data had 127 interview responses across all six successfully changed organizations (Table 14). Among the six challenged organizations, one of the main positive themes was change advantage in leadership (Table 15, 47 responses). Also, the most notable negative theme among these organizations is leader's limitation (Table 16, 46 responses). Since these three themes provide descriptive information about what characteristics a leader should and should not have to promote organizational change, they are merged together into one main theme of transformational leadership, with a total number of 220 responses, which is about one-fourth of the total comments for all interviews (872 responses).

Seven positive sub-categories emerge from the six successfully changed organizations (see Table 14.) for transformational leadership, including leader's positive character (36 responses by six sites; all four types of respondents), leader's awareness (27 responses by six sites; all four types of respondents), leader's communication (16 responses by four sites; all four types of respondents), leader's ability (15 responses by four sites; from leaders, mid-managers, and employees), leader's implementation strategy (14 responses by three sites; from leaders, mid-managers, and employees), leader's self-improvement during change (11 responses by four sites; from leaders only), and leader's positive experience (five responses by four sites; from leaders, mid-managers, and employees).

Meanwhile, the four positive sub-categories from the challenged organizations (see Table 15.) include leader's positive character (15 responses by six sites; all four types of respondents), leader's awareness of change (13 responses by six sites; from leaders only), leader's ability (nine responses by four sites; all four types of respondents), and leader's self-improving (eight responses by four sites; from leaders only).

There are four negative sub-categories about limitations of leadership that obstruct the change (see Table 16), including leader's lack of abilities (22 responses by six sites; from leaders, mid-managers, and employees), leader's negative characteristics (10 responses by six sites; from leaders only), leader's lack of awareness of change (nine responses by four sites; from leaders, mid-managers, and employees), and leader's lack of communication with upper government (five responses by four sites; from leaders only).

Table 14. Transformational Leadership in Successful Organizations
(T=total; L=Leader; M=Mid-managers/Members; C/P=Client/Partner; please see case key table before Table 1)

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/P	T	L	M	C/	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Transformational Leadership	Leader's positive character	6	6	0	0	8	5	3	0	11	7	4	0	3	2	1	0	3	2	1	0	5	3	2	0	36	127
	Leader's awareness	5	3	1	1	5	5	0	0	3	3	0	0	5	5	0	0	4	4	0	0	5	5	0	0	27	
	Leader's communication	4	1	3	0	7	4	3	0	2	1	1	0	3	1	2	0	0	0	0	0	0	0	0	0	16	
	Leader's ability	0	0	0	0	0	0	0	0	2	2	0	0	7	4	3	0	2	0	2	0	4	4	0	0	15	
	Leader's implementation strategy	3	2	1	0	6	4	2	0	0	0	0	0	0	0	0	0	0	0	0	0	5	2	3	0	14	
	Leader's self-improvement during change	0	0	0	0	0	0	0	0	2	2	0	0	2	2	0	0	3	3	0	0	4	4	0	0	11	
	Leader's positive experience	1	1	0	0	1	1	0	0	2	2	0	0	1	0	1	0	0	0	0	0	0	0	0	0	5	
	Leader's positive practice during change	0	0	0	0	0	0	0	0	0		0	0	0	0	0	0	3	1	2	0	0	0	0	0	3	
Total		19	13	5	1	27	19	8	0	22	17	5	0	21	14	7	0	15	10	5	0	23	18	5	0		

Table 15. Change Advantage in Leadership in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Change advantage in Leadership	Leader's positive character	4	4	0	0	3	0	2	1	3	2	1	0	3	1	2	0	1	1	0	0	1	0	1	0	15	47
	Leader's awareness of change	3	3	0	0	2	2	0	0	3	3	0	0	1	1	0	0	3	3	0	0	1	1	0	0	13	
	Leader's ability	5	2	1	2	1	1	0	0	2	1	1	0	1	0	1	0	0	0	0	0	0	0	0	0	9	
	Leader's self-improving	0	0	0	0	2	2	0	0	2	2	0	0	3	3	0	0	1	1	0	0	0	0	0	0	8	
	Leader's positive experience	0	0	0	0	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	
Total		12	9	1	2	10	5	4	1	10	8	2	0	8	5	3	0	5	5	0	0	2	1	1	0		

Table 16. Leader's Limitation in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Leader's limitation	Leader's lack of abilities	3	3	0	0	1	1	0	0	3	1	2	0	5	4	1	0	5	4	0	1	5	2	3	0	22	46
	Leader's negative character	1	1	0	0	2	2	0	0	1	1	0	0	1	0	1	0	3	3	0	0	2	2	0	0	10	
	Leader's lack of awareness about change	1	1	0	0	0	0	0	0	1	1	0	0	2	2	0	0	0	0	0	0	5	4	1	0	9	
	Leader's lack of communication with upper government	0	0	0	0	0	0	0	0	1	1	0	0	2	2	0	0	1	0	1	0	1	1	0	0	5	
Total		5	5	0	0	3	3	0	0	6	4	2	0	10	8	2	0	9	7	1	1	13	9	4	0		

An employee mentioned in the interview that her leader "has his own thoughts and model of how to conduct certain change or project, then he disseminates his ideas to the mid-level managers and us. When we trust him, we then have motivation to follow him with his methods" and that "he knows how to communicate with us, monitor and motivate us, and seek for training opportunity for us" (BUC interview, mid-level managers and employees). Another mid-level manager considers his leader a role model: "Our director's working ability is very high. He is a pioneer for this change. He shared his thoughts with us, listened to our

concerns, and discussed with us in every stage of change." Further, "He always knew how to assign the right person to do the right thing" (XRG interview, mid-level managers and employees). These interviewees from the successfully changed organizations revealed that their leaders have the ability to convince powerful people to listen to their employees.

Results of questionnaire data analysis also indicate that, in questions related to the transformational leadership theme, successfully changed organizations report more positive comments and fewer negative comments, while challenged organizations report more negative comments and fewer negative comments (see Table 17.). A Yates correction test further attests that the relationship stated above is significant: X^2 (1, N = 315) = 100, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.68, SD=0.30) and negative responses (M=2.62, SD=0.71); t (61)=7.81, p = 0.00.

Table 17. Questionnaire Data: Transformational Leadership Theme

Leadership	Successful	Challenged	Total
Positive	165	78	243
Negative	0	72	72
Total	165	150	315

This questionnaire result further illustrates that transformational leadership is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of the transformational leadership theme analysis is indicated.

2. ***Comprehensive implementation strategy is an important capacity for a Chinese public health organization to succeed in organizational change.***

The second theme, *implementation strategy*, combines two OCC concepts: incremental deployment and practices based on consensus. The implementation strategy theme in Chinese public health organizations contains a step-by-step change process that implements the change gradually and encourages their members to gain new knowledge and skills, solve problems, and actively participate in the change progress. The theme also includes sub-categories, such as preparation of change, deployment of responsibilities, steps of change, communication during change, strategies of change, and methods that motivate and promote an organizational member's knowledge and skills improvement.

According to the interview data, the implementation strategy theme (116 responses from all 12 organizations) had 95 positive responses in successfully changed organizations (implementation strategy; see Table 18.) and 21 positive responses in challenged organizations (positive strategy of change; see Table 19.).

In the six successfully changed organizations, ten sub-categories arise under the theme of implementation strategy (Table 18.), including structural improvement (14 responses by five sites; all four types of respondents), preparation of change (11 responses by three sites; from leaders, mid-level managers, and employees), service improvement (11 responses by four sites; all four types of respondents), cultural and rule improvement (nine responses by four sites; from leaders, mid-level managers, and employees), training opportunity (eight responses by five sites; from leaders, mid-level managers, and employees), construction improvement (eight responses by four sites; all four types of respondents), evaluation and supervision during the change (five responses by three sites; from leaders, mid-level managers, and employees), target shifting during the change (four responses by two sites; all

four types of respondents), publicity of change (four responses by two sites; from leaders, mid-level managers, and employees), and technical improvement strategy (four responses by one site; from mid-level managers, employees, and partners/clients). One sub-category of a positive strategy during change appeared in interviews with the six challenged organizations (see Table 19): service improvement (10 responses by three sites; all four types of respondents).

Table 18. Implementation Strategy in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Implementation Strategy	Structural improvement	4	2	1	1	0	0	0	0	3	1	2	0	3	1	2	0	2	2	0	0	2	2	0	0	14	95
	Preparaion of change	7	6	1	0	0	0	0	0	3	3	0	0	0	0	0	0	0	0	0	0	1	0	1	0	11	
	Service Improvement	0	0	0	0	0	0	0	0	2	1	1	0	1	1	0	0	5	0	4	1	3	0	2	1	11	
	Culture and rule improvement	0	0	0	0	1	0	1	0	4	3	1	0	0	0	0	0	1	0	1	0	3	2	1	0	9	
	Training Opportunity	1	1	0	0	3	2	1	0	1	1	0	0	1	0	1	0	0	0	0	0	2	2	0	0	8	
	Construction Improvement	0	0	0	0	2	0	0	2	4	1	2	1	1	1	0	0	0	0	0	0	1	0	0	1	8	
	Evaluation and supervision during the change	2	1	1	0	0	0	0	0	1	1	0	0	2	1	1	0	0	0	0	0	0	0	0	0	5	
	Target shifting during change	3	1	1	1	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	4	
	Publicity of change	0	0	0	0	2	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	2	0	4	
	Technical improvement strategy	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	3	1	0	0	0	0	4	
	Task distribution	1	0	1	0	0	0	0	0	0	0	0	0	2	1	1	0	0	0	0	0	0	0	0	0	3	
	Resource inputs	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	3	
	Regular meetings during the change	2	1	1	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	3	
	Investigation to partners	0	0	0	0	0	0	0	0	0	0	0	0	2	1	1	0	0	0	0	0	0	0	0	0	2	
	Internal system change	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	1	1	0	0	2	
	Motivation	0	0	0	0	2	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	
	Informationization	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Communication with upper-level government during change	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	1	
Total		22	14	6	2	11	6	3	2	20	12	7	1	14	7	7	0	13	3	8	2	15	7	6	2	95	

Table 19. Positive Strategy of Change in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Positive strategies of change	Service improvement	4	2	1	1	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	5	1	3	1	10	21
	Internal system change	0	0	0	0	0	0	0	0	2	1	0	1	0	0	0	0	0	0	0	0	1	0	1	0	3	
	Training opportunity	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	1	1	0	0	2	
	Clear deployment	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Culture building	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Structure improvement	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Rules and culture improvement	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Evaluation to members	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Clear task deployment	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	0	0	1	
Total		4	2	1	1	2	0	2	0	5	3	1	1	2	0	0	2	1	0	1	0	7	2	4	1	21	

One leader of a participating organization (BRG) told his story of management and change implementation during his interview:

> I took some of my colleagues, mostly mid-level managers, with me when I negotiated with partner organization and upper government. This way, they had their own perceptions of the change process. When they went back, they would then communicate with base-level employees to make them understand the change value and process. I perceive our organization as one unit. I am open to all kinds of questions my people may have, and I discuss with them from time to time with my own concerns. That is how we developed the whole implementation plan for this change.

Mid-level and base level employees of participating organizations (BRH) also provided their experiences of planning and implementing the changes, "Our leader requires us to keep learning new abilities and knowledge during work. When this new step of change first started, we had different thoughts. As time went by, we perceived the progress of change and understood the value better than before"; "we were also motivated by the passion of our leader in conducting the change. He mobilized all our energy by communicating with us during the change, and encouraging us when we accomplished our short-term goals"; "a monthly newspaper summarizes our achievements, suggestions, and work focuses during certain period. By reading it, we get motivated and gain detailed information about every aspect of our organization." These interview responses support the definition and sub-categories of the theme implementation strategy by showing a "step-by-step" changing process and a collectively problem-solving system.

Results of questionnaire data analysis also indicates that, in questions related to the implementation strategy theme, successfully change organizations reported more positive comments and fewer negative comments, while challenged organizations report more negative comments and fewer negative comments (see Table 20.). A Yates correction test further affirms that the relationship stated above is significant, X^2 (1, N = 315) = 108, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.62, SD=0.31) and negative responses (M=2.44, SD=0.56); t (61)=10.54, p = 0.00.

Table 20. Questionnaire Data: Implementation Strategy Theme

Implementation	Successful	Challenged	Total
Positive	163	70	233
Negative	2	80	82
Total	165	150	315

The questionnaire result further illustrates that a comprehensive implementation strategy is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of comprehensive implementation strategy theme analysis is indicated.

3. Member's positive characteristic is an important capacity for a Chinese public health organization to succeed in organizational change.

Member's positive characteristic is not a main concept in the OCC framework. However, it comes up as an important capacity that significantly promotes organizational change in this study on Chinese public health organizations. Under this theme, member characteristics that

improve efficiency, solidarity among other members, previous positive experience, awareness and consensus of change value, and skills are all proved to be beneficial in enacting the change. Thus, in China, member's self-quality is essential for an organization to achieve successful change as a whole.

According to the interview data, member's positive characteristics (81 responses, from all 12 organizations) has 34 positive responses in successfully changed organizations (member's positive characteristics; see Table 21.), 22 positive responses in challenged organizations (member's advantage in promoting the change; see Table 22), and 25 negative responses in challenged organizations (member's self-limitation; see Table 23.).

Within the theme of member's positive characteristics, there are two positive sub-categories from successfully changed organizations, which are characteristics that promote efficient work (25 responses by six sites; all four types of respondents) and solidarity among members (six responses by three sites; all four types of respondents).

Three positive sub-categories emerge from the interviews with challenged organizations about member's positive characteristics (member's advantage in promoting the change), including member's positive traits (10 responses by three sites; all four types of respondents), member's awareness of change (six responses by two sites; from leaders, mid-level managers, and employees), and member's skills (four responses by three sites; from mid-level managers and employees).

There are also three negative sub-categories about member's characteristics that obstruct the change (member's self-limitation), including a lack of skill (10 responses by four sites, all four types of respondent), member's negative characteristics (10 responses by five sites, from

leaders, mid-level managers, and employees), and member's unawareness of change (five responses by two sites; from mid-level managers and employees).

Table 21. Member's Positive Characteristics in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/	T	L	M	C/	T	L	M	C/	T	L	M	C/P	T	L	M	C/	T	L	M	C/		
Member's positive character	Characters that promote efficient work	2	0	2	0	3	0	3	0	7	2	4	1	5	2	2	1	3	1	2	0	5	2	3	0	25	34
	Solidarity among Members	0	0	0	0	4	3	1	0	0	0	0	0	1	0	1	0	1	0	0	1	0	0	0	0	6	
	Member's previous experience	0	0	0	0	1	1	0	0	1	1	0	0	0	0	0	0	1	1	0	0	0	0	0	0	3	
Total		**2**	**0**	**2**	**0**	**8**	**4**	**4**	**0**	**8**	**3**	**4**	**1**	**6**	**2**	**3**	**1**	**5**	**2**	**2**	**1**	**5**	**2**	**3**	**0**	34	

Table 22. Member's Advantage in Promoting the Change in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Member's advantage in promoting the change	Member's positive character	2	1	0	1	0	0	0	0	0	0	0	0	5	1	1	3	0	0	0	0	3	0	2	1	10	22
	Member's awareness of change	0	0	0	0	5	1	4	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	6	
	Member's skills	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0	1	0	1	0	4	
	Member's consensus on change value	0	0	0	0	0	0	0	0	1	0	1	0	1	1	0	0	0	0	0	0	0	0	0	0	2	
Total		**4**	1	2	1	**5**	1	4	0	**1**	0	1	0	**6**	2	1	3	**1**	0	1	0	**5**	0	4	1	22	

Table 23. Member's Self-Limitation in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Member's self-limitation	Lack of skills	3	2	1	0	2	0	1	1	0	0	0	0	0	0	0	0	3	1	2	0	2	2	0	0	10	25
	Member's negative character	1	0	1	0	3	0	3	0	3	3	0	0	2	0	2	0	1	0	1	0	0	0	0	0	10	
	Member's unawareness of change	0	0	0	0	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	3	0	5	
Total		**4**	**2**	**2**	**0**	**7**	**0**	**6**	**1**	**3**	**3**	**0**	**0**	**2**	**0**	**2**	**0**	**4**	**1**	**3**	**0**	**5**	**2**	**3**	**0**	25	

A leader of a successfully changed organization (BRH) stated in her interview, "People who work here are most educated and intellectual. They are very responsible for their own tasks. They have pure minds, and they value the skills. It is not hard to overcome conflicts between them." She also stated, "They also have really high executive power. As I said, they are pure-minded intellectual individuals. They have little disagreements." Members of successfully changed organizations also mentioned their member's good characteristics during the interview: "we are pretty familiar with each other's responsibilities within our site.

We are also pretty flexible in switching and adding tasks when it is necessary for the change implementation" (BUC interview, mid-level managers and employees).

Results of questionnaire data analysis also indicate that, in questions related to member's positive characteristics, successful organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (see Table 24.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 189) = 25, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.72, SD=0.45) and negative responses (M=2.43, SD=0.68); t (61)=8.98, p = 0.00.

Table 24. Questionnaire Data: Member's Positive Characteristics Theme

Positive Character	Successful	Challenged	Total
Positive	99	68	167
Negative	0	22	22
Total	99	90	189

This questionnaire result further illustrates that member's positive character is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of member's positive character theme analysis is indicated.

4. Communication and transparency is an important capacity for a Chinese public health organization to succeed in organizational change.

Communication and transparency is the fourth theme that fits into another two concepts of OCC, including collectively built change process and creation of transparency. It contains

collectively-built change processes that include communication and discussions between members and collective problem-solving and learning during organizational change as well as creation of fundamental transparency with open and continuous negotiation of the change implementation process, its purposes, possible results, and the actions undertaken that enable all members to better understand the change. In this study, the term *Communication and transparency* not only embraces the two OCC concepts mentioned above, but it also describes the communication with partners and external parties.

According to the interview data, the communication and transparency theme (64 responses, from 11 organizations) has 26 positive responses in successfully changed organizations (communication; see Table 25) and 28 negative responses in challenged organizations (lack of communication and transparency; see Table 26.).

Two sub-categories about communication from the successfully changed organizations (see Table 25) are communication between members (27 responses by six sites; all four types of respondents) and communication with partners (six responses by one site; all four types of respondents).

Meanwhile, one negative sub-category about lack of communication and transparency emerged from the interviews with the challenged organizations (see Table 26.): lack of communication with members (26 responses by four sites; all four types of respondents).

Table 25. Communication in Successfully Changed Organizations

Theme	**Category**	**BRG**				**BUC**				**BRH**				**XRG**				**XRH**				**XUC**				**Total**	
		T	L	M	C/	**T**	L	M	C/	**T**	L	M	C/	**T**	L	M	C/P	**T**	L	M	C/	**T**	L	M	C/		
Communication	communication between members	**4**	0	2	2	**5**	1	4	0	**5**	2	3	0	**6**	4	2	0	**4**	2	2	0	**3**	3	0	0	**27**	**36**
	communication with partners	**6**	1	1	4	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**6**	
	communication with external parties	**3**	2	0	1	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**3**	
Total		**#**	**3**	**3**	**7**	**5**	**1**	**4**	**0**	**5**	**2**	**3**	**0**	**6**	**4**	**2**	**0**	**4**	**2**	**2**	**0**	**3**	**3**	**0**	**0**	**36**	

Table 26. Lack of Communication and Transparency in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Lack of communication and transparency	Lack of communication with members	**0**	0	0	0	**6**	0	6	0	**3**	0	2	1	**5**	2	3	0	**12**	7	3	2	**0**	0	0	0	**26**	**28**
	Lack of communication with clients	**2**	0	1	1	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**2**	
Total		**2**	**0**	**1**	**1**	**6**	**0**	**6**	**0**	**3**	**0**	**2**	**1**	**5**	**2**	**3**	**0**	**12**	**7**	**3**	**2**	**0**	**0**	**0**	**0**	**28**	

Members of the successfully changed organizations responded that they have relatively high levels of communication and transparency. “We have a very high level of transparency in this organization. Our director (Leader) always shares information he gets from meetings with upper-level government with us during our weekly regular meetings” and “anyone who brings up a valued topic could have chance to present it to all with a seminar discussion format,” members of a successfully changed organization stated (BRG interview, mid-level managers and members). “We are invited to participate in their regular meetings, listen to what they’ve been doing, raise questions, and discuss with them our cooperation,” a interviewee from a partner site said. Regarding his experience of working with one of the participating organizations, he also stated:

> They provided every guidance and suggestion we need, but more on a policy level, public management level, something that they had to take care of. We don’t have any problem on communication. There will be disagreements, but we share the same direction and goal. They never limited us, and they empowered us. That is why we have now an almost complete authority on running the hospital. They led us good. We got along very well together (BRG interview, client/partner).

Interviewees in the challenged organizations also mentioned their negative experiences that were caused by lack of communication and transparency: *“*We mainly communicated

with our manager instead of the senior leader. To be honest, I am really not so aware of value or goal of this change. As a base level employee, I feel that I am pretty far away from the top leader, who is the one that received messages from upper government" (BUG interview, mid-level managers and employees). The lack of communication in this organization led to member's lack of awareness of change purpose and value, therefore lost member's support.

Results of questionnaire data analysis also indicated that, in questions related to the communication and transparency theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (see Table 27.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 63) =21, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.77, SD=0.32) and negative responses (M=2.62, SD=0.53); t (61)=10.50, p = 0.00.

Table 27. Questionnaire Data: Communication and Transparency Theme

Communication	Successful	Challenged	Total
Positive	33	14	47
Negative	0	16	16
Total	33	30	63

This questionnaire result further illustrates that communication and transparency is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of communication and transparency theme analysis is indicated.

5. Sufficient upper-level government support is an important capacity for a Chinese public health organization to succeed in organizational change

In the OCC framework, government impact is not a main construct in organizational change capacity in Western theory. Thus, the role of *government support* in the present study on Chinese public health organization's change capacity is somewhat unique. As public organizations, the participating sites are strictly controlled by their upper-level government agencies. Their organizational changes are mostly initiated and led by the government. In the interviews, we learned that organizations that lack of government support and empowerment could have great difficulties in conducting changes. Both changed and challenged organizations reported their struggles during organizational change when they had limited support from the upper government. The challenged organizations have more negative responses, though. Many respondents also claimed that government policies that initiate the change could sometimes be too abstract or could even misguide the implementation.

According to the interview data, government support (59 responses, from 11 organizations) has 20 negative responses about government issues obstructing the change in successfully changed organizations (see Table 28.) and 39 negative responses in challenged organizations (see Table 29.).

Three of the same sub-categories about government support appear in both successfully changed organizations and challenged organizations, including empowerment issue (nine responses by 4 successfully changed sites; from leaders, mid-level managers, and employees; see Table 28; eight responses by 5 challenged sites; all four types of respondents; see Table 29.), lack of government support (seven responses by 4 successfully changed sites; from

leaders, mid-level managers, and employees; see Table 28; 16 responses by 5 challenged sites, all four types of respondents; see Table 29.), and upper-government limitation(four responses by 3 successfully changed sites; from leader and partner/client; see Table 28; 15 responses by 4 challenged sites; all four types of respondents; see Table 29.).

Table 28. Government Issues that Obstruct Change in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/	T	L	M	C/	T	L	M	C/	T	L	M	C/P	T	L	M	C/	T	L	M	C/		
Government issues that obstruct the change	Empowerment issue	1	1	0	0	4	3	1	0	0	0	0	0	0	0	0	0	2	0	2	0	2	1	1	0	9	20
	Lack of government support	0	0	0	0	2	1	1	0	1	1	0	0	1	1	0	0	3	2	1	0	0	0	0	0	7	
	Upper-government limitation	1	0	0	1	0	0	0	0	1	1	0	0	2	2	0	0	0	0	0	0	0	0	0	0	4	
Total		2	1	0	1	6	4	2	0	2	2	0	0	3	3	0	0	5	2	3	0	2	1	1	0	20	

Table 29. Government Issues that Obstruct Change in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Government issues that obstruct the change	Lack of government support	0	0	0	0	4	2	2	0	4	4	0	0	3	2	1	0	2	1	0	1	3	2	1	0	16	39
	Upper-government limitation	0	0	0	0	2	1	0	1	7	5	1	1	0	0	0	0	5	4	0	1	1	0	1	0	15	
	Empowerment issue	0	0	0	0	1	1	0	0	3	1	2	0	1	0	1	0	2	1	1	0	1	0	1	0	8	
Total		0	0	0	0	7	4	2	1	14	10	3	1	4	2	2	0	9	6	1	2	5	2	3	0	39	

A leader of a community health center in Beijing (BUC) stated, “We really need more people to work for us during this time, but we cannot at this point. It takes a very long process for the government to admit an open position for us. We really hope the government could provide more opportunities for us in training, or financial assistance.” A director of a district health bureau (XUG) also shared upper government’s negative influence in his organization: “The original plan sent from the upper government is vague. To apply the change to individual organization, support policy with detail is needed. We as a local bureau do not have the authority to make major change to the reform plan. It usually takes a very long time for the upper government to approve our request of need.” Government’s lack of support and its inefficiency obstruct the organization from succeeding in change.

A notable finding is that most responses of the theme *government support* are from urban organizations (42 urban responses in 59 total responses). Thus, public health organizations in

the urban areas of China may be subjected to more control of their upper-level government while those in the rural area are enjoying relatively more freedom in creating their own ways of implementing change. A leader of a district health bureau in a rural area (BRG) shared his experience of creating his unique path for organizational change, and three statements are shared here: "We started to think how we should change. At first, we had a lot of ideas in mind," "we asked specialists in the field, and collected related information about possible way of reform," and "we encountered some disagreements from different levels; however we insisted on doing this and finally gained support from our city government."

Results of questionnaire data analysis also indicated that, in questions related to government support theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (see Table 30.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 189) = 42, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.50, SD=0.34) and negative responses (M=2.55, SD=0.44); t (61)=9.64, p = 0.00.

Table 30. Questionnaire Data: Government Support Theme

Government Support	Successful	Challenged	Total
Positive	76	27	103
Negative	23	63	86
Total	99	90	189

This questionnaire result further illustrates that sufficient upper-level government support is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each

other with the same conclusion, the convergent validity of sufficient upper-level government support theme analysis is indicated.

6. Member's consensus on change is an important capacity for a Chinese public health organization to succeed in organizational change

This theme can fit into two OCC concepts: the value of change and the perceived legitimacy of the change. It describes a shared organizational change value in its purpose and importance. This shared value keeps organizational members motivated while initiating and implementing the change. It also covers member's commitment to change, the persistence of their efforts, their shared resources, and their satisfaction in work during organizational change.

According to the interview data, member's consensus on change (51 responses, from 12 organizations) had 27 positive responses in successfully changed organizations (see Table 31.) and 24 negative responses in challenged organizations (lack of member's support; see Table 32.).

The two positive sub-categories about member's consensus on change in successfully changed organizations (see Table 31) include member's understanding of change value (18 responses by six sites; all four types of respondents) and consensus on change implementation (six responses by two sites; from leaders, mid-level managers, and employees).

From the challenged organizations, there are two negative sub-categories describing the weak situation with a lack of member's support during change (see Table 32), including

member's disagreement on change value (15 responses by six sites; from leaders, mid-level managers, and employees) and lack of motivation (five responses by three sites; from leaders, mid-level managers, and employees).

Table 31. Member's Consensus on Change in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/	T	L	M	C/	T	L	M	C/	T	L	M	C/P	T	L	M	C/	T	L	M	C/		
Member's consensus on change	Member's understanding of change value	2	0	1	1	4	3	1	0	3	2	1	0	3	2	1	0	4	2	2	0	2	1	1	0	18	27
	Consensus on change implementation	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	3	0	3	1	2	0	6	
	Practices to reach value consensus	2	1	1	0	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	3	
Total		4	1	2	1	4	3	1	0	4	2	2	0	3	2	1	0	7	2	5	0	5	2	3	0	27	

Table 32. Lack of Member's Support in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Lack of member's support	Member's disagreement on change value	5	2	3	0	1	0	1	0	2	1	1	0	4	1	3	0	2	0	2	0	1	1	0	0	15	24
	Lack of motivation	3	1	2	0	0	0	0	0	1	1	0	0	0	0	0	0	1	1	0	0	0	0	0	0	5	
	Dissatisfaction in increasing working load	0	0	0	0	2	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	
	Member's disagreement on change Implementation	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
	Member's disagreement on work value	0	0	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
Total		8	3	5	0	3	1	2	0	5	4	1	0	4	1	3	0	3	1	2	0	1	1	0	0	24	

Members of a participating organization shared their experiences of working with a group based on value consensus (BRG interview, mid-level managers and employees)" "First the leaders all support this reform completely. Then we as members coordinated with each other to implement the change. We communicated a lot to reach an agreement on the value of this reform. Our directors are skilled in linking everyone together. Even the lowest-level members understand the meaning of change"; "we feel that we can communicate really well. During the discussion, we can also have more understanding of our own responsibilities. We are working based on consensus."

Leader and employees of a challenged organization also recalled their negative experiences of conducting the unsuccessful changes while having lots of disagreements on change value and process, and they recalled how the disagreements obstructed the change: “I don’t think this change is necessary at all. But the upper-government is monitoring us, and they force us to implement this reform”; “our work load keep increasing due to the change, and we even don’t have time to focus on our original goals”; “it is very hard to motivate our members or gain their support to do extra work while they cannot really understand the meaning of this change” (BRC interviews, leader, mid-level managers and employees).

Results of questionnaire data analysis also indicated that, in questions related to member’s consensus on change theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (see Table 33.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 189) = 51, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.79, SD=0.35) and negative responses (M=3.22, SD=0.57); t (61)=4.83, p = 0.00.

Table 33. Questionnaire Data: Member's Consensus on Change Theme

Member's consensus	Successful	Challenged	Total
Positive	99	51	150
Negative	0	39	39
Total	99	90	189

This questionnaire result further illustrates that member’s consensus on change is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each

other with the same conclusion, the convergent validity of member's consensus on change theme analysis is indicated.

7. Healthy structure is an important capacity for a Chinese public health organization to succeed in organizational change

The term *healthy internal system* covers the OCC concept of structural flexibility. It describes characteristics of an organic structure with which an organization could have a well-functioning personnel system, appraisal system, evaluation system, member work satisfaction, and high service quality.

According to the interview data, healthy internal system (26 responses, from 6 organizations) has all 26 negative responses about internal system problem in challenged organizations (see Table 34).

Three negative sub-categories were identified in interviews with the challenged organizations: structure system issue (nine responses by four sites; all four types of respondents), personnel system issue (nine responses by five sites; all four types of respondents), and appraisal system issue (five responses by four sites; from leaders and partners/clients).

Table 34. Internal System Limitation in Challenged Organizations

Theme	Category	BRC				BUG				BUH				XUH				XUG				XRC				Total	
		T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P	T	L	M	C/P		
Internal system limitation	Struture system issue	**2**	1	1	0	**4**	2	1	1	**2**	1	1	0	**1**	1	0	0	**0**	0	0	0	**0**	0	0	0	**9**	**26**
	Personnel system issue	**2**	2	0	0	**0**	0	0	0	**3**	0	3	0	**1**	0	1	0	**1**	1	0	0	**2**	1	0	1	**9**	
	Appraisal system issue	**1**	1	0	0	**1**	1	0	0	**0**	0	0	0	**2**	2	0	0	**1**	0	0	1	**0**	0	0	0	**5**	
	Low medical service quality	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**2**	0	1	1	**2**	
	Unsatisfied working environment	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**0**	0	0	0	**1**	0	1	0	**1**	
Total		**5**	**4**	**1**	**0**	**5**	**3**	**1**	**1**	**5**	**1**	**4**	**0**	**4**	**3**	**1**	**0**	**2**	**1**	**0**	**1**	**5**	**1**	**2**	**2**	**26**	

Members of one challenged organization described how the internal system issue disturbed their working enthusiasm:

> It [organizational structure] is totally not flexible. As mid-level and base level employees, we got so confused about the upper structure within the leading team. Because we are public hospital, the government assigns the management team and changes their title and responsibility all the time. It's hard for us to understand clearly about what each of them is responsible for. This month I report to this director, next month I may report to another. Thus, I couldn't work at high efficiency with such a mess (BUH interview, mid-level managers and employees).

"We really do not have much authority to make structure change. We need a lot more doctors, but we cannot get permission from the government," another participating organization's employees stated (BUC interview, mid-level managers and employees). The inefficient internal structure creates great difficulties for these organizations to implement their organizational changes.

Results of questionnaire data analysis also indicated that, in questions related to the healthy internal system theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (Table 35.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 315) = 99, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.62, SD=0.32) and negative responses (M=3.02, SD=0.44); t (61)=6.16, p = 0.00.

Table 35. Questionnaire Data: Healthy Internal System Theme

Internal System	Successful	Challenged	Total
Positive	162	73	235
Negative	3	77	80
Total	165	150	315

This questionnaire result further illustrates that a healthy internal system is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of healthy internal system theme analysis is indicated.

8. Member's self-improvement is an important capacity for a Chinese public health organization to succeed in organizational change

The theme of *member's self-improvement* describes member's capacity of individual learning, of new ways of thinking, and of new ways of operating the change.

According to the interview data, member's self-improvement (25 responses, from 6 organizations) has 25 positive responses all from interviews to the successfully changed organizations (see Table 36). There is no sub-category of this theme since every member achieved different kinds of improvement.

Table 36. Member's Self-improvement in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/	T	L	M	C/	T	L	M	C/	T	L	M	C/P	T	L	M	C/	T	L	M	C/		
Member's improvement during change		3	0	3	0	4	1	3	0	4	0	4	0	6	0	6	0	3	0	3	0	5	0	5	0	25	25
Total		3	0	3	0	4	1	3	0	4	0	4	0	6	0	6	0	3	0	3	0	5	0	5	0	25	

Members of a participating organization summarized their positive improvements during the change in their interview: "I think I care for more things within our organization than before. I am not only doing my own work, but also participating in the larger reform. I

learned a lot from this process," and "we gain more experiences in dealing with different types of patients. I increased my communication skills" (XRH interview, mid-level managers and employees). Employees from another successfully changed organization also shared their learning experiences: "I expanded my work area during the reform and work with higher efficiency. Sometimes I brought work home and finished it at midnight. I can also deal with more types of data"; "I was new here at the beginning of the change. At first I had a lot of pressure, but then I feel that I am enriched by my responsibilities" (BRH interview, mid-level managers and employees).

Results of questionnaire data analysis also indicated that, in questions related to member's self-improvement theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations reported more negative comments and fewer negative comments (see Table 37.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 126) = 6, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=2.93, SD=0.56) and negative responses (M=2.20, SD=0.47); t (61)=5.68, p = 0.00.

Table 37. Questionnaire Data: Member's Self-improvement Theme

Self-Improvement	Successful	Challenged	Total
Positive	66	53	119
Negative	0	7	7
Total	66	60	126

This questionnaire result further illustrates that member's self-improvement is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each

other with the same conclusion, the convergent validity of member's self-improvement theme analysis is indicated.

9. Cooperation with external parties is an important capacity for a Chinese public health organization to succeed in organizational change

Another organizational change capacity theme from this study that does not fit into the Western OCC framework is *cooperation with external parties during the change*. Chinese public health organizations work closely with their partner sites during their organizational change. These external parties may include police officers, local resident committees, related government agencies, and other similar organizations within the same area. Findings in this study indicated that an organization's quality of work with external sites as partners, relationship building with partners, and the partner's awareness of change value greatly affects the successfulness of organizational change.

According to the interview data, the theme if cooperation with external parties (21 responses, from 5 organizations) has all 21 positive responses from interviews with the successfully changed organizations (see Table 38).

These two positive sub-categories include work cooperation through the change (12 responses by five sites; all four types of respondents) and relationship building with partners (six responses by four sites; all four types of respondents).

Table 38. Cooperation with External Parties in Successfully Changed Organizations

Theme	Category	BRG				BUC				BRH				XRG				XRH				XUC				Total	
		T	L	M	C/	T	L	M	C/	T	L	M	C/	T	L	M	C/P	T	L	M	C/	T	L	M	C/		
Cooperation with external parties	Work cooperation through the change	1	0	1	0	2	2	0	0	2	1	0	1	2	1	0	1	0	0	0	0	5	4	1	0	12	21
	Relationship building with partners	2	1	0	1	1	1	0	0	0	0	0	0	1	0	0	1	0	0	0	0	2	1	1	0	6	
	Partner's consensus on change value	2	0	0	2	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	0	0	0	0	0	3	
Total		**5**	**1**	**1**	**3**	**3**	**3**	**0**	**0**	**2**	**1**	**0**	**1**	**4**	**1**	**0**	**3**	**0**	**0**	**0**	**0**	**7**	**5**	**2**	**0**	**21**	

A partner member of a successfully changed organization described his experience of working with the organization through its change,

> They worked so well with us. We make decisions as a family, we have consensus in conducting the reform. It is very meaningful for both us and the health bureau. As I just said, the purpose of this reform is to improve health service, also develop mutual benefits for our company and the health bureau. This type of management model can be spread to other public hospitals, as well as organizations like community health centers, if possible (BRG interview, client/partner).

A leader of the same organization also shared his view of the partner site: “They came to us, actively, asking for possible cooperation. We designed the whole plan carefully in 17 negotiations with them. We discussed everything: how to keep the stable status of current employees, how to separate power and authorities” (BRG interview, leader). Another organizational leader recalled his experience of working with partner organization:

> I realized that we need some partners when we are rapidly rejected while trying to collect local residents’ health information. They don’t trust us, or our services. So we first made contact with the local resident committee and asked them for help. After I explained the importance of this reform, the vice director decided to sign a cooperation contract with us and provide human power and resources to support our change. We earned the trust from

local residents greatly because of the cooperation with the committee. We cannot succeed in change without their support (XUC interview, leader).

Cooperation with external organizations that have similar or related missions help these organizations to build better relationship with their target population, and promote their organizational change.

Results of questionnaire data analysis also indicated that, in questions related to the cooperation with external parties theme, successfully changed organizations reported more positive comments and fewer negative comments, while challenged organizations to report more negative comments and fewer positive comments (see Table 39.). A Yates correction test further testifies that the relationship stated above is significant, X^2 (1, N = 126) = 15, p <. 01. A T-test also shown that there was a significant difference between positive responses (M=3.38, SD=0.64) and negative responses (M=2.62, SD=0.70); t (61)=4.51, p = 0.00.

Table 39. Questionnaire Data: Cooperation with External Parties Theme

Cooperation	Successful	Challenged	Total
Positive	60	36	96
Negative	6	24	30
Total	66	60	126

This questionnaire result further illustrates that cooperation with external parties is an important change capacity for a Chinese public health organization to succeed in organizational change. Since the results of interview and questionnaire analysis support each other with the same conclusion, the convergent validity of the cooperation with external parties theme analysis is indicated.

10. Leaders of Chinese public health organization respond more to the transformational leadership theme than do other interviewee groups

Interviews indicated that the leader was the type of participant who most frequently described the theme of transformational leadership. Leaders in the participating organizations mostly provided positive comments during the interviews, regardless of their change levels. A leader of a public hospital in Beijing described her feeling of learning and improving during the change of her organization:

> I couldn't tell you how much I've achieved from this reform, not only the success we are celebrating right now, but also the skills and knowledge I learned during the process of change. I was a doctor before I became director of this hospital. My profession is about treating individuals, rather than managing a team, an organization. Through this change, however, my management and communication skills have improved so much, as well as my knowledge of cooperation with other sites, and awareness of policy direction in this field (BRH interview, leader).

The analysis of questionnaire data in transformational leadership theme further proved this result. The numbers of positive comments between the leader group and other respondent groups (mid-level manager and employee, and patient and partner) were compared. The comparison indicated that in other groups, positive comments in successfully changed organizations occurred much more frequently than in challenged organizations. However, among leaders, there was no significant difference in the number of positive comments between successfully changed organizations and challenged organizations (see Table 45.). Two Yates correction tests are applied separately to test the conclusion above. Difference of

positive comment amounts in leader group between the two change levels of organizations is not significant (P>.05), while the difference in other groups is significant (P<. 01).

Table 40. Questionnaire Positive Comments in Transformational Leadership Theme

Leadership (Positive)	Successful	Challenged	Total
Leader	30	30	60
All other groups	135	48	183
Total	165	78	243

The combination of interview and questionnaire results suggests that leaders in Chinese public health organizations may not be fully aware of their limitations when their organizations are challenged in achieving successful change or innovation. According to the data shown above, leaders in both the successfully changed organizations and the challenged organizations report similar amount of positive responses about their leadership, while other interviewees (mid-level managers, employees, and clients/partners) in the challenged organizations report significantly less positive responses than those interviewees in the successful organizations. Thus, leader in Chinese public health organization is very likely to be too over-confident of their leadership to realize their own weaknesses.

The Grounded Theory – CNOCC

As indicated in chapter three, two study questions guide the present research. The answers are here.

1. Is the OCC theory applicable in Chinese public health organizations?

Yes, the OCC theory is applicable in Chinese public health organizations, but with a modified form than articulates in Western literature.

Within the Organizational Change Capacity framework (OCC), concepts of the change process dimension and organizational context dimension were used to design the original interview questions for this study. The OCC concepts that were applied when designing questions include transformational leadership, incremental deployment, collectively built changing process, creation of transparency, the perceived legitimacy of change, the value of change, structure flexibility, cultural cohesion, trust, practices based on consensus, and capability of individual learning (see Figure 2).

Interviews are conducted in twelve Chinese public health organizations in two major cities, Xi'an and Beijing. Organizations participated include four public hospitals, four local community centers, and four government agencies. Senior leaders, mid-level managers, base-level employees, patients, and partners within the twelve participating organizations are recruited for individual interview or focus group interview. After the first round of open coding to the interview data, follow-up close-ended questionnaires are sent to the 72 participants with questions that are similar to the interview. 63 participants complete the questionnaire and send them back to the researcher.

As explained in the major findings above, based on the analysis of both interview and questionnaire data, most of the concepts or themes in the Western OCC theory remain important for Chinese public health organizations when they are experiencing change or innovation. When asking interview and questionnaire questions related to these themes, participants from the successfully changed organizations provide more positive responses and less negative responses, while participants from the challenged organizations report more negative comments and less positive comments.

New organizational change capacity concepts for Chinese public health organizations are also emerged from this study.

2. How should the OCC framework be modified to better fit Chinese public health organizations?

A newly modified theory emerged during the analysis of data that is specific to organizational change capacities among Chinese public health organization in achieving successful change or innovation. Since the theory is based on the original Western Organizational Change Capacity theory (OCC), it is called the Chinese Organizational Change Capacity theory (CNOCC). The nine main themes that emerged from this analysis are transformational leadership, implementation strategy, member's positive characteristics, communication and transparency, government support, member's consensus on change, healthy internal system, member's self-improvement during the change, and cooperation with external parties during change.

Most of the concepts in the OCC framework are match with the CNOCC themes, except the themes of culture cohesion and trust. Compare to other factors like leadership, inner

organizational operation system, organizational member's change capacity, and external relationship with upper government and other organizations, organizational culture and member's trust with each other and with the leader seem to have less influence to the success level of organizational change. Many participants report that although their relationship with leaders or other members are not very trustful, or the organization they belong to does not have a strong shared culture, their organization still went through change smoothly and successfully.

New concepts also emerged during the analysis and are main themes of CNOCC, which include member's positive characteristics, government support, and cooperation with external parties during change (see Figure 3.).

Under the theme of member's positive character, member traits that improve efficiency, solidarity among other members, previous positive experience, awareness and consensus of change value, and skills are all proved to be beneficial in promoting the successful change. The participants from this study report that members with these positive characters usually work well with colleagues and may support the leader with change-related decision-making and major tasks. Organizational member's individual change capacity is an essentially important capacity for an organization to transform as a whole. Member's receptivity to change is a similar concept in Western organizational development studies, which represents member's self-interest (Armenakis & Bedeian, 1999), or individual factors such as personality attributes and cognitive processes (Frahm & Brown, 2007). However, member's positive character theme in this study covers not only individual's perception or personality, but also member's experience and skills in work. Although member's positive character is

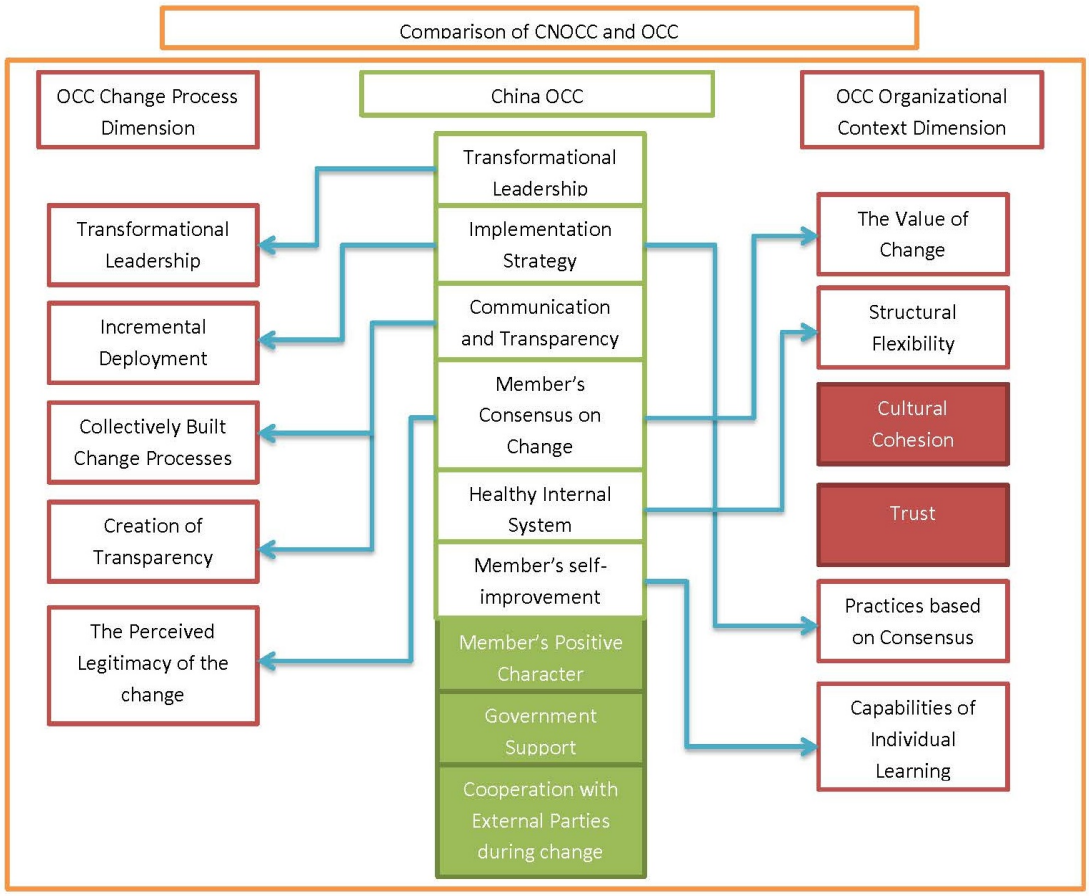
not an OCC concept and does not usually appear in other organizational change theories, researchers may want to address the importance of this theme in the Western countries in future studies.

The theme of government support is another newly emerged theme in CNOCC. Interviewees from this study indicate that in China, public health organizations are strictly controlled by their upper-level government agencies. Their organizational changes are mostly initiated and led by the government. Thus, adequate policy and resource support from the government became significant advantage for the successful organizations in conducting the change, while lack of government support became serious limitation for the challenged organizations that failed to change. Government support is not a concept that belongs to the Western OCC theory. However, the importance of government support in organizational change has been addressed in other Western organizational change literature, especially the studies related to organizational change in public sector (Dowling & Pfeffer, 1975; Fernandez & Rainey, 2006).

The last new CNOCC theme is cooperation with external parties. Many successfully changed organizations in this study explore their own paths of change through relationship building with external sites. These external parties may include police officers, local resident committees, related government agencies, and other similar organizations within the same area. Findings in this study indicated that an organization's quality of work with external sites as partners, relationship building with partners, and the partner's awareness of change value greatly affects the successfulness of organizational change.

Figure 3 below demonstrates a comparison of the Western Organizational Change Capacity Theory (OCC) and the Organizational Change Capacity Theory (CNOCC) that built from this study. In the graph, the concepts of OCC framework (left and right columns) are listed beside the CNOCC themes (middle column). The arrow(s) from each CNOCC theme point to the Western OCC concept(s) it comes from. Some themes are creating from multiple OCC concepts (for example, implementation strategy come from both incremental deployment and practices based on consensus), while some themes are newly emerged from this study (for example, member's positive character is a new theme emerged from Chinese public health organizational change). This figure further illustrates the relationship between the original OCC theory and the newly grounded CNOCC theory.

Figure 3. Comparison of OCC and Chinese Organizational Change Capacity Theory (CNOCC)



Discussion of Implications for Future Research and Practice

This research indicates that the Western Organizational Change Capacity Theory (OCC) is applicable in a modified form to public health organizations in China. Change capacities described in the OCC framework are also essential elements for Chinese health organizations in achieving successful change or innovation. The study creates a new theory called Chinese Organizational Change Capacity Theory (CNOCC), which includes not only the key elements from the original Western OCC theory but also themes that directly emerge from interviews with active participants in the public health field in China.

Implication 1: Transformational leaders are critical asset in Chinese public health organizations that succeed at organizational change. Leaders with the abilities to get members involved for a change, build a shared value of the initiative's importance, and encourage employees with their discussions of the change are extremely important for organizational changes. Further, the findings of this study indicates that leaders of Chinese public health sites are not fully aware of the weakness of their leadership skills that may negatively affect their organizational change. They should increase their awareness of the importance of transformational leadership during change, including the ability to convince powerful people within the organization of a change initiative's importance, listening to employees, and actively supporting their discussions of the change. Future studies might explore how characteristics of transformational leadership may be taught or instilled in Chinese public health organizations.

Implication 2: The CNOCC framework can be utilized as a tool to design a self-check evaluation for Chinese public health organizations before attempting to implement

organizational change. Through the CNOCC evaluation, public health organizations in China should be able to detect the strengths and weaknesses of their organizational change capacity by measuring level of each theme within the framework. The public health sites may improve their change capacity based on the evaluation results, thereby achieving successful change in the future. Researchers may also develop organizational change capacity intervention based on the CNOCC theory, apply the intervention to public health organizations in China, and guide and assist them through their changes.

Implication 3: Government support is an essential component of Chinese public health organizations' transformation or change. Participants of this study express that supportive policies of reform, human and financial resources, and empowerments are highly required for their organizations to express their change potential fully. Without certain supports from their upper-level government, they are mostly confined and incapable of change implementation, or even self-development. Organizations with higher level of government supports usually experience smoother and less challenged change environment, and are easier to succeed in their innovations. Future research may focus on mechanism for influencing government support for Chinese public health organizations.

Implication 4: With such a large population in China, networking among sites is another critical element in organizational change for public health sites. Cooperation with external parties in related fields highly expands the methods of change implementation and increases Chinese public health organizations' reform efficiency and likelihood of success. Many participants in this study report that their organization was able to explore a unique path of change through relationship building with other related sites, including police officers, local

resident committees, related government agencies, and other similar organizations within the same area. Future research in Chinese public organizational change may focus on the development of cooperation with related institutions during organizational change and innovation.

Implication 5: Member's positive character, government support, and cooperation with external parties are the three newly emerged themes of CNOCC framework from this study. Although they are not major concepts in the Western OCC theory, factors that are similar to these three themes are found in other Western organizational change literature (See major findings section above). Thus, comprehensive comparison of similarity and difference in organizational development between the Western and eastern countries can be made through more and more future studies in applying Western organizational theories into Eastern society.

Research in applying other Western organizational development theories to Asian countries can be meaningful and helpful for both sides. Asian public health organizations may benefit from these studies by learning scientific paths to their future improvement. Researchers in Western countries will also gain a better understanding of public health development with a global view. As the world is getting united every day, public health problems will never be exclusively local issues any more. Globalization requires more connections in public health internationally. Future research may focus on the application of Western organizational development theory in Eastern countries.

Implication 6: Considering its exploratory nature, the current study adopts a mixed method with qualitative interview/focus group and follow-up quantitative survey instruments. This

psychometric method provides convergent validity to the study, helps the researcher to better understand the participant's response, establish rational coding process, and develop more accurate results. Future research may also focus on applying mixed method with a combination of qualitative data and survey instruments together more widely into organizational development intervention studies.

In summary, to increase the capacity of organizational change, Chinese public health organizations should focus more on transformational leadership building, as well as on cooperation development with external sites. The government may consider providing more support in terms of policy, resources, and empowerment to aid public health organizations towards successful change. The CNOCC framework developed from this study can be utilized as either a tool or a guideline for Chinese public health organizations to conduct self-evaluation of their change capacity level. The CNOCC framework can also offer a theoretical foundation for researchers to design interventions that help Chinese public health organizations increase their change capacity and achieve successful change. Studies on the applicability of Western organizational change theory in Asian countries should be encouraged to promote public health organization development all over the world.

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Appendix A: data management protocol

Study Method Rationale and Information

In order to understand how OCC theory may be applicable in China, the following questions are applied to orient and guide the research:

• *Is the OCC theory applicable in Chinese health-related organizations concerned with public health?*
• *How should the OCC framework be modified in order to better fit Chinese health-related organizations concerned with public health?*

The assumption underlying this research is that when an organization has high change capacity according to the OCC framework, the organization has greater receptivity to innovations in community public health.
Considering the generative characteristic of this study, a qualitative design is most appropriate. Grounded theory was chosen to derive a general theory of organizational change capacity for Chinese health organizations based on the OCC framework. The goal of this grounded theory analysis is not only to uncover unique conditions of organization change in China, but also to determine how participants under observation in Chinese organizations actively respond to those conditions, and to the consequences of their organizational behavior.

Major participants in Chinese public health organizations

City/Type	Beijing	Xi'an
Government Agencies	Senior leader (SL)	Senior leader (SL)
	Mid-level managers (MLM)	Mid-level managers (MLM)
	Employee (EM)	Employee (EM)
	Partner/client (P/C)	Partner/client (P/C)
Hospitals	Senior leader (SL)	Senior leader (SL)
	Mid-level managers (MLM)	Mid-level managers (MLM)
	Employee (EM)	Employee (EM)
	Partner/client (P/C)	Partner/client (P/C)

Community Health Service Centers	Senior leader (SL)	Senior leader (SL)
	Mid-level managers (MLM)	Mid-level managers (MLM)
	Employee (EM)	Employee (EM)
	Partner/client (P/C)	Partner/client (P/C)

Data Collection Protocols

**Due to the complexity of OCC model and time limit of interview and focus group, elements in two of the three dimensions in the OCC model will be designed to transfer into questions below and developed as potential elements of the Chinese OCC model. Elements of learning dimension will not be tested during this study since they are relatively unimportant in determining the organizational capacity of change comparing elements in the other two dimensions and much harder to evaluate by the qualitative methods we apply in this study.*

Step 1: In-depth Interview (face to face among senior level organizational leaders and partner/client) and focus group (with MLM and EM together in a same room for each organization)

Sample Questions

Questionnaire Question	Target Participant	Related OCC Model Elements
Overall, what major changes have been made in your organization for this initiative (specific policy change by health reform)? For each change: -How easy was that change? -What made it easy/hard? -Why/ how?	SL, MLM, EM, P/C	General OCC model
For this initiative, how would you characterize the role of leadership in adopting the changes? -Can you provide some examples of how	SL, MLM, EM	Transformational Leadership

your leader influences to help the organization towards adopting the changes?		
How well do you think your organization implementing the changes? Why do you feel that way? What types of strategies did your organization use to get maximum success? -Why? -Could you explain the strategies step by step?	SL, MLM, EM,	Incremental Deployment Practices based on consensus
How were you involved in these changes? How were you able to work with other levels of people? Examples?	SL, MLM, EM	Collectively built change processes
How well-known were the changes within the organization during changing process?	SL, MLM, EM	Creation of Transparency
How would you recognize the need of changes to your organization base on the specific public health policy initiative?	SL, MLM, EM, P/C	The perceived legitimacy of the change
How well-received are the changes by different levels of members? Who value the changes the most/ least? -Why? -How did their attitude influence others in the organization?	SL, MLM, EM	The value of change
What part of organizational structure	SL, MLM, EM, P/C	Structural Flexibility

changed in adopting the changes? -How did these changes happen? -What were some obstacles to these structure changes? How did the organization deal with them?		
How did the organization overcome conflicts between members during changing process?	SL, MLM, EM	Culture Cohesion
In this organization, how well does member trust each other? -How does it influence the changing process?	SL, MLM, EM, P/C	Trust
What did you learn through the changes?	SL, MLM, EM	Capabilities of individual learning

The OCC model above will be shown to the participants at the end of the interview/ focus group session to gain their ideas of importance of each element.

Step 2: Pro-Interview Open-ended Questionnaire

Questions may be modified after analyzing the interview/ focus group data:

Questionnaire Question	Target Participant	Related OCC Model Elements
Overall, what do you think are the most important elements within the OCC model to accomplish successful organizational change? -Why do you think that way? -How did your organization perform on those important elements you listed above	SL, MLM, EM, P/C	The whole OCC model

during changes? Why?		
What did you find most and least successful about your organization's strategy of implementing change? Why?	SL, MLM, EM, P/C	The whole OCC model

Data Analysis Protocols

A Grounded theory qualitative approach is applied in this study. Ground theory data analytic approach takes a line-by-line open-coding analysis and constantly compares the data searching for themes/categories. This strategy is used in analyzing data collected from Chinese health organizations to generalize about OCC elements that affect organizational change capacity. By using open coding, data are broken down to help the analyst get fresh insights into the future study design.

An inductive approach will also be applied during the data analysis process to create possible new elements that can be added into the OCC model to fit the Chinese society. Inductive approach starts with the data and develops categories from the raw data. This process creates as many categories as fit successive, separate incidents, while coding into as many groups as possible. New groups emerge and new factors fit into existing groups.

Data analysis in a grounded theory designed research begins right after the interview/focus group data is collected. Analysis from this step is necessary here because it directs the next pro-interview open-ended questionnaire.

Qualitative comparative analysis (QCA) is used in this study to make sure the resulting concepts are compared with each other and grouped, then built into the theory. QCA is designed for analyzing data sets by listing and counting all the combinations of variables observed in the data set, and then

applying the rules of logical inference to determine which descriptive inferences or implications the data supports (Ragin, 1987). In the case of this study, QCA begins by listing and counting all types of cases that occur, where each type of case is defined by its unique combination of values in the OCC model. By counting the number of observations that exist, QCA can determine which descriptive inferences or implications are empirically supported by a data set.

Comparison within and across different cities (Beijing, Xi'an), levels of participants, degrees of success (successfully changed, unsuccessfully changes), types of organizations will be analyzed during data analysis process to reach a better understanding of Chinese public health organizational change during health reform.

As stated in data collection section, analysis process begins after the collection of interview/focus group data. Second analysis could not start until researcher successfully collects questionnaire data from participants in this study. This way, date from every organization could be analyzed in an equal condition. Analysis of documents could happen at the same time. During the data analysis process, some elements within the OCC framework developed by Klarners and his colleague (2007) may be testified. These elements are keeping as components of organizational change capacity framework to Chinese organizations. New elements may emerge at the same time. These elements are unique as they emerge in China and suitable to Chinese public health organizations. Framework is developed with a combination of two groups of elements described above.

Appendix B: Questionnaire sample

This questionnaire is meant to gather your opinion regarding the study "Western Organizational Change Capacity Theory and Its Application in Chinese Public Health Organizations: A Multiple Case Analysis". The purpose of this study is to better understand how organizational change occurs in Chinese public health organizations and how western organizational change capacity theory may be useful in facilitating desired organizational changes. The [*Specific Organizational Reform in this organization*] is one of the programs that we are interested in understanding regarding how your organization managed change.

Please answer all of the following questions in reference to this program. Please keep in mind that as a doctoral student and researcher, I have an obligation to protect the identity of those responding to this questionnaire. Therefore, all of your answers will be confidential and will not be included in my doctoral dissertation analysis and publications. Instead, your responses will be combined with all other responses and be reported as mathematical scores with no identifying makers that can link an individual to their answer. If you have any questions about the questionnaire, please contact me at xueyzhao@indiana.edu.

Organization: *****

PLEASE CHECK THE RESPONSE THAT BEST CHARACTERIZES YOU POSITION IN YOUR ORGANIZATION

__Leader

__Mid-level Manager/Employee

__Client/Partner

__Other (Describe your position)

Application of Western Organizational Change Capacity Theory in Chinese Public Health Organizations

Pro-interview Questionnaire to Participants

1. To what extent can your leader convince powerful people to implement the [*Specific Organizational Reform in this organization*]? (Please answer for yourself if you are the leader)

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

2. To what extent does your leader listen to employees when implementing the [*Specific Organizational Reform in this organization*]? (Please answer for yourself if you are the leader)

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

3. To what extent does your leader actively support employees' discussions when implementing the [*Specific Organizational Reform in this organization*]? (Please answer for yourself if you are the leader)

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

4. To what extent was your leader fully aware of the [*Specific Organizational Reform in this organization*]'s value during implementation? (Please answer for yourself if you are the leader)

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

5. To what extent is your leader skilled in implementing the [*Specific Organizational Reform in this organization*]? (Please answer for yourself if you are the leader)

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

6. To what extent did your organization prepare in advance for the organizational change that required when adopting the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

7. To what extent did your organization share responsibilities among staff in a reasonable manner when implementing the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

8. To what extent did your organization implement the [*Specific Organizational Reform in this organization*] with a step-by-step process?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

9. To what extent did your organization employ a planned method or strategy for motivating member's knowledge regarding the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

10. To what extent did your organization employ a planned method or strategy in motivating member's skill improvement?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

11. To what extent was there sufficient discussion among members of your organization when implementing the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

12. To what extent did organizational members share a belief in the importance of the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

13. To what extent did your organizational members demonstrate a commitment to implementing the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

14. To what extent did your organizational members demonstrate persistence in their actions when implementing the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

15. To what extent does your organization have a well-functioning personnel system in operation?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

16. To what extent does your organization have a well-functioning appraisal system in operation?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

17. To what extent does your organization have a well-functioned program evaluation system in operation?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

18. To what extent are members of your organization satisfied with their work?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

19. To what extent does your organization provide high service quality?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

20. To what extent do members of your organizational demonstrate the ability to learn new ways of thinking when implementing the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum	Moderate	Maximum

	Extent	Extent	Extent
1	2	3	4

21. To what extent do members of your organizational demonstrate the ability to learn new ways of operating when implementation the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

22. To what extent are members of your organizational able to accomplish their daily tasks?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

23. To what extent are members of your organizational willing to dedicate to your organizations mission?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

24. To what extent are members of your organizational aware of the [*Specific Organizational Reform in this organization*]?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

25. To what extent does your organization have empowerment from the city government and bureau of health reform?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

26. To what extent does your organization have policy support from the city government and bureau of health reform?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

27. To what extent does your organization have resource support from the city government and bureau of health reform?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

28. To what extent does your organization work closely with other organizations (external) that have similar missions?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

29. To what extent does your organization build well strategic relationships with other (external) organizations that have similar missions?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

30. To what extent is there trust between your organizational leader and the staff of the organization?

Not at all	Minimum	Moderate	Maximum
1	2	3	4

31. To what extent do members within your organizational trust each other?

Not at all	Minimum	Moderate	Maximum
1	2	3	4

32. To what extent does your organization have a culture of cohesion?

Not at all	Minimum Extent	Moderate Extent	Maximum Extent
1	2	3	4

This is the end of the questionnaire. Thank you!

Appendix C: Interview taxonomy (Rough data)

Case Number	Case Name	Case City	Case Attribute
1	MHB	BJ	SUC
2	FCH	BJ	SUC
3	MPH	BJ	SUC
4	YHB	XA	SUC
5	141H	XA	SUC
6	XCH	XA	SUC
7	QCH	BJ	FAI
8	FHB	BJ	FAI
9	YYH	BJ	FAI
10	WPH	XA	FAI
11	WHB	XA	FAI
12	YCH	XA	FAI

OCC Element	Code
Transformational Leadership	TL
Incremental Deployment	ID
Collectively built change processe	CC
Perceived legitimacy of change	PL
Value of change	VC
Structual flexibility	SF
Culture cohesion	CC
Trust	TR
Practices base on consensus	PC
Capacities of individual learning	IL

Interviewee	Code
Senior Leader	A
Mid-m/Employee	B
Partner/Client	C

Term Attrib	Code
Positive	1
Negative	2

Key	Categories	Cover Terms	Included Terms	Attri	Case	Intervi	Quote Link
Transformational Leadership	Leader's awareness	Leader's internal awareness	Leader's awareness of change necessity	1	1	A	P1-26
			Leader's awareness of potential risks	1	1	A	P2-14
			Leader's clear understanding of change value	1	1	C	P1-8
		Leader's external awareness	Leader's awareness of partner's potential advantages	1	1	B	P2-6
			Leader's objective view of external condition	1	1	A	P2-15
	Leader's ability	Leader's communication	Leader's information sharing to members from upper conference	1	1	B	P3-11
			Leader's consultation with external experts	1	1	A	P2-3
			Leader's well communication skill in explaining the change value	1	1	B	P2-9
			Leader's creation of transparency through communication in meetings	1	1	B	P2-17
		Leader's experience of change	Leader's experience of initiating and promoting multiple innovations	1	1	A	P4-11
		Leader's implementation skill	Leader's exploration of possible ways of change	1	1	A	P2-5
			Leader's full supports throughout the change process	1	1	B	P1-27
			Leader's rational judgment on current change progress	1	1	A	P5-30
	Leader's characteristic	Leader's determination	Leader's certainty of trust among members	1	1	A	P6-5
			Leader's confidence of change when facing difficulties	1	1	A	P2-23
			Leader's courage of establishing unique path of change	1	1	A	P2-11
		Leader's goodwill	Leader's insistence of change against disagreements	1	1	A	P2-28
			Leader's inspiration of broader change value during the implementation	1	1	A	P5-21
			Leader's modesty in confirming partner's effort in change	1	1	A	P5-18
Collectively built change process	Target shifting during change		Adjustment of major tasks in different stage of change	1	1	B	P1-14
			Change in authority and responsibility to promote the change	1	1	C	P1-9
			Shift of authority and responsibility during change	1	1	A	P3-24
	Communication	communication with partners	Adequate negotiation with partners	1	1	C	P2-27
			Adequate communication with partner during change	1	1	C	P1-18
			Negotiations with partners	1	1	A	P2-31
			Negotiations with partners before the change	1	1	B	P1-29
			Permission to partner to participate in internal regular meetings	1	1	C	P1-12
			Guidance and suggestions to partner during change	1	1	C	P1-16
		communication between members	Brain-storm during meetings	1	1	B	P2-18
			Effective communication pattern across different level of members	1	1	B	P3-21
			Free idea-exchange between members during meetings	1	1	C	P2-32
			Unhindered communication between members	1	1	C	P2-30
		communication with external parties	Communication with all related organizations and individuals	1	1	A	P4-27
			Negotiation with upper-level government to broaden the policy limit	1	1	C	P2-14
			Striving in gaining upper-level political supports	1	1	A	P4-21
	Cooperation with external parties		Cooperation with related agencies by work together in reform council	1	1	B	P3-31
	Empowerment	Empowerment to committee	Empowerment of full authority to the administrative committee	1	1	B	P1-7
		Empowerment to partners	Empowerment to cooperating partner	1	1	A	P3-25
		Empowerment to other parties	Empowerment to subordinate organizations and other related sites	1	1	A	P7-5
			Empowerment to subordinate organizations and partner	1	1	C	P1-10
Consensus on value and legitimacy	Member's consensus on value		Basic-level employees' consensus on meaning of change	1	1	B	P3-8
			High understanding of change meaning across the organization	1	1	C	P2-21
	Partner's consensus on value		Consensus building on direction and value of change with partner	1	1	C	P1-19
			Partner's consensus on change value	1	1	C	P3-4
Implementation deployment	Task distribution		Rational strategy of separating responsibilities in different departments	1	1	B	P4-9
	Preparaion of change	Consideration prior to change	Consideration of cost	1	1	A	P3-11
			Consideration of mutual benefits (Site, Members, Partner)	1	1	A	P3-7
			Consideration of stability	1	1	A	P3-13
			Cooperation with other organizations in conducting the change	1	1	B	P1-5
			Learn lessons from other organizations that have failed to change	1	1	A	P3-5

		Plan development	Establishment of implementation plan	1	1	A	P3-6
			Development of partnership cooperation plan	1	1	A	P2-35
	Establishment of new boards	Establishment of management board	Establishment of management team	1	1	C	P1-11
			Establishment of new governing board to promote the change	1	1	A	P5-24
			Formation of administrative committee (board)	1	1	B	P1-3
		Establishment of supervisor board	Establishment of new supervising board to promote the change	1	1	A	P5-24
	Evaluations throughout the		Evaluations of change progress throughout the implementation	1	1	A	P5-15
			Third-party evaluations throughout the change	1	1	B	P2-30
	Resource inputs		Financial inputs throughout the changing process	1	1	A	P4-28
			Resource replenishment during change	1	1	A	P7-7
	Member's coordination		Members' coordination in changing process	1	1	B	P3-4
			Members' understanding of their responsibilities from meetings	1	1	B	P2-25
Trust	Trust among members	Trust in change	Members' trust building through evaluation results sharing	1	1	B	P2-36
			Trust building through sharing progress	1	1	B	P2-2
		Trust in leader	Members' trust in their leader's ability in managing the organization	1	1	B	P2-8
			Members' trust in their leader's ability towards change	1	1	B	P2-8
	Trust among partners		Partner's trust on the organization	1	1	C	P1-21
Cultural Cohesion	Relationship building		Solidarity of organization-partner relationship	1	1	C	P2-20
			Strategy to reach harmony in member-partner relationship	1	1	A	P3-15
Practices in reaching consensus	Practices in overcoming difficulties		Renovation of performance appraisal strategy to promote the change	1	1	C	P2-17
			Overcoming conflicts between members by communication	1	1	A	P5-4
			Overcoming conflicts between members by progress sharing	1	1	A	P5-14
	Practices to reach value consensus		Building of value consensus through regular meetings	1	1	B	P2-21
			Meetings that help members to reach consensus on change value	1	1	A	P5-2
Creation of transparenc y	Regular meetings during the change		Regular meetings about implementation planning	1	1	A	P5-26
			Regular meetings about implementation planning	1	1	B	P2-13
Authority of change	Upper-level supports		Upper-level policy support	1	1	B	P2-3
Individual learning ability	Member's improvement during change		Member's individual improvement in understanding work value	1	1	B	P4-19
			Member's individual improvement in working ability through change	1	1	B	P4-15
	Member's learning opportunity		Members' individual learning by sharing new insights to other agencies	1	1	B	P3-14
			Training opportunity for members	1	1	A	P3-31
Difficulties due to authority limit			Difficulties that are hard to solve at organizational level	2	1	A	P6-19
			Difficulties that have to be solved at political level	2	1	C	P1-35
			Financial difficulties that may restrict the innovation	2	1	C	P2-12
Structure flexibility	Difficulties in structure change		Difficulty in organizational structure change	2	1	A	P6-30
Lack of member			Lack of member participation during change initiation	2	1	B	P1-24
Disagreeme nt among members			Member disagreement about cooperating partner	2	1	C	P2-40

Categories	Cover Terms	Included Terms	Attr	Ca	Int	Quote
Transformational Leadership	Leader's Awareness	Leader's awareness of larger success beyond the change	1	2	A	P4-16
		Leader's awareness of importance in partnerships	1	2	A	P4-17
		Leader's awareness of change legitimacy and necessity	1	2	A	P6-12
		Leader's clear understanding of organizational fuction	1	2	A	P1-6
		Leader's awareness of situations in other similar organizations	1	2	A	P3-16
	Leader's Strategies during Change	Leader's positive reaction to problems raised by members	1	2	B	P2-6
		Leader's supervision of change process on-site	1	2	B	P2-15
		Leader's innovative strategies in trying new ways to promote the change	1	2	A	P2-5
		Leader's exploration on changing model	1	2	A	P3-2
		Leader's acamemic research on the specific reform	1	2	A	P3-4
		Leader's efforts in requesting policy supports from upper-level	1	2	A	P3-18
	Leader's Communication with Members	Leader's ability in communicating and spreading his own thoughts to members	1	2	B	P2-10
		Leader's communication with members about implementation process	1	2	A	P5-2
		Leader's encouragement to members when accomplishing each step of change	1	2	A	P5-6
		Leader's willingness of communicating with any member personally	1	2	B	P2-22
		Leader's encouragement for members to express disagreements	1	2	B	P3-1
		Leader's communication with members to spread the idea of new model	1	2	A	P3-3
		Leader's encouragement to members in academic study	1	2	A	P3-7
	Leader's Characters and Abilities	Leader's reach resources and relations that benefit the change	1	2	A	P4-14
		Leader's ability in developing new theories and strategies	1	2	B	P2-9
		Leader's confidence of spreading the change model to other organizations	1	2	A	P8-7
		Leader's high reputation among members	1	2	B	P2-3
		Leader's personality of uniting members together	1	2	B	P2-7
		Leader's strong education background in related field	1	2	A	P3-5
		Leader's determination in successfully conduct the change	1	2	A	P3-14
		Leader's selfless contribution in promoting thre organization towards its goal	1	2	A	P4-13
		Leader's self-satisfaction by successfully implementing the change	1	2	A	P8-18
Change Value Consensus among Members		Management level members' understanding of meaning of change	1	2	A	P1-14
		Consensus on change value among members	1	2	A	P5-13
		Member's consensus on change value	1	2	B	P1-25
		Management level members' understanding of organization's responsibility	1	2	A	P1-13
Solidarity among Members		Building culture cohension by sharing materials with motivating articles	1	2	A	P5-18
		Trust between members while teamworking during the change	1	2	A	P7-11
		Good culture of solidarity among members	1	2	A	P7-12
		Member's agreements on changing strategies	1	2	B	P4-5
Trust and Transparency		Good culture of democracy and transparency during work	1	2	A	P7-18
		Member's trust on leaders/each other	1	2	B	P4-16
Stategies of Implementation	Training Opportunity	Training opportunity for management level employees to study abroad	1	2	A	P1-8
		Training opportunity for members to learn advanced knowleage	1	2	A	P5-3
		Trainings for newly recruited members	1	2	B	P4-25
	Rationship Building with Clients	Trustful relationship building with clients	1	2	A	P8-4
		Clients' trust on organizational members	1	2	C	P1-2
		Member's considerate care on cleints	1	2	C	P1-4
	Cooperation with other organizations	Relationship building with local agencies and residents' committee	1	2	A	P2-14
		Cooperation with local organizations in publicizing the change through media	1	2	A	P2-15
		Cooperation with local organizations in motivating local residents to participate	1	2	A	P2-16
	Motivation	Strategies of raising members'motivation in conducting the change	1	2	A	P5-9
		Building culture cohension by sharing materials with motivating articles	1	2	A	P5-18
	Publicity of change	Cooperation with local organizations in publicizing the change through media	1	2	A	P2-15
		Efforts in publicizing the changing service	1	2	B	P1-12
	Informationizatio n	Development in Informationization to improve services	1	2	A	P2-1
	Construction	Organizational imrpovement on facilities	1	2	C	P1-11

	Improvement	Organizational improvement on expanding the place to promote the change	1	2	C	P1-20
Member's Features	Member's skills and chatacters	Members' previous working experience in larger organizations	1	2	A	P1-19
		Members' skills that are needed during change	1	2	A	P1-20
		Meticulous character of members who can handle detailed work	1	2	B	P2-28
		Member's familarity for each other's work responsibilities	1	2	B	P4-27
		Member's flexibility in switching tasks when needed	1	2	B	P4-28
	Member's self improvement	Member's improvement in communication ability	1	2	B	P5-2
		Member's improvement in management ability	1	2	B	P5-4
		Relationship improvement among members during the change	1	2	B	P5-6
		Improvement of members' working quality and skills	1	2	A	P1-18
Communication among Members		Regular meetings during change	1	2	B	P2-16
		Well communication between base level members and mid-managers	1	2	B	P2-24
		Change-related materials that sent to everyone	1	2	B	P2-27
		Brainstorm while discussions during change	1	2	B	P2-32
Internal Regulations		Clear internal regulations and policies about rewards and penalties	1	2	B	P2-16
Policy Supports from government	Positive supports from government	Policy Supports on training programs	1	2	A	P1-9
		Policy Supports in building the partnership with other organizations	1	2	A	P4-18
Lack of supports from government		Financial difficulties that are hard to solve due to limited authority	2	2	A	P3-22
		Complaints among members about increasing work and same income	2	2	A	P6-2
		Inadequacy of matching pilicies from upper government	2	2	A	P6-5
		Lack of authority in structual change	2	2	A	P7-1
		Lack of humanpower due to authority limit	2	2	A	P7-5
		Low employee satisfaction due to financial issues	2	2	A	P8-8
		Inadequacy of matching pilicies from upper government	2	2	B	P1-31
		Lack of authority in structual change	2	2	B	P4-11

Categories	Cover Terms	Categories	Attri	Case Number	Interview Number	Quote Link
Transformational Leadership	Leader's characters and abilities	Leader's high efficiency at work	1	3	A	P2-2
		Leader's well communication with members	1	3	A	P2-3
		Leader's full respect to members	1	3	A	P2-4
		Leader's empathy to members	1	3	A	P2-6
		Leader's understanding of member's values of work	1	3	A	P2-7
		Leader's power of influence others	1	3	B	P2-13
		Leader's character of studiousness	1	3	B	P2-14
		Leader's acceptance in adopting member's suggestions	1	3	B	P2-15
		Leader's quick response to problems	1	3	A	P4-7
		Leader's character of centralism	1	3	B	P2-12
	Leader's awareness about the change	Leader's awareness of member's goals and needs	1	3	A	P2-8
		Leader's awareness of member's advantages	1	3	A	P3-23
		Leader's awareness of change barriers to members	1	3	A	P4-19
	Leader's background and experienes	Leader's higher education experience	1	3	A	P3-5
		Leader's working experience at clinical level	1	3	A	P3-7
		Leader's willingness of acting as role model	1	3	A	P4-15
	Leader's attitude towards the change	Leader's positive attitude about the change	1	3	A	P5-5
		Leader's braveness of exploring new path of reform	1	3	A	P5-7
		Leader's confidence of overcoming conflicts	1	3	A	P5-8
		Leader's encouragement to members during change	1	3	B	P1-9
	Leader's self-improvement during change	Leader's self-improvement in expertise during change	1	3	A	P5-14
		Leader's self-improvement in management and communication skills during change	1	3	A	P5-17
Organizational improvements and strategies during the change	Structure improvement	Change of department settings	1	3	A	P1-9
		Establishement of dispute-solving office	1	3	B	P1-31
		Establishement of patient reception center	1	3	B	P2-4
	Management system improvement	Change of performance apraisal	1	3	A	P1-10
		Trainings provided to members	1	3	A	P3-9
		Regular administrative reform-promoting meetings	1	3	B	P2-22
	Environmental improvement	Improvement in site environment	1	3	A	P1-10
		Improvement in site area and room cleanliness	1	3	B	P1-3
		Improvement in expanded functions	1	3	B	P1-6
		Improvement in equipment	1	3	C	P1-12
	Culture and rule improvement	Implantation of traditional Chinese culture into the organization	1	3	A	P2-14
		Adoption of international evaluation standard	1	3	A	P2-25
		Posters and signs of implanting culture and regulations	1	3	A	P4-17
		Establishement of rules and regulations in uniform, service and management	1	3	B	P2-5
	Service Improvement	Disciplinary construction	1	3	A	P2-30
		Improvement in categorized services	1	3	B	P1-7
Partner cooperation		Cooperation with partner to bring best people here	1	3	A	P3-4
		Cooperation with partner to establish new management strategies	1	3	C	P2-5
Collectively built implementation process	Planned changing process	Plans for both short-term and long-term goals	1	3	A	P4-22
		Smooth change process	1	3	A	P1-21
		Explaination of implementation in each stage	1	3	A	P4-11
	Information sharing and	Information spreading by site magazine	1	3	B	P2-26
		Recommendations collection once a year	1	3	B	P2-28
	Supervision during the change	Manager's supervision on implementation	1	3	A	P4-5
	Communication among members	Regular Meetings during change	1	3	A	P4-4
		Regular administrative inquiring in collecting suggestions	1	3	A	P4-6
		Department-level regular meetings to reach consensus	1	3	B	P2-30
Chang-promoting characters among members	Member's consensus on	Culture of cohesion among members	1	3	A	P2-12
		Member's consensus on change value	1	3	A	P4-24
	Member's experience and skills	Member's strong education background in the field	1	3	A	P3-30
		Member's high executive power	1	3	A	P4-24
		Sharing and guidiance from experienced members to new members	1	3	C	P2-4
	Member's positive characters	Member's resposible character for their tasks	1	3	A	P4-1
		Member's appreciation on good skills	1	3	A	P4-2
		High level of trust between members	1	3	B	P3-10
	Member's positive awareness	Member's awareness of self-barrier to change	1	3	B	P1-21
		Member's positive view of pressures as motivations	1	3	B	P1-24
		Member's consensus on goals and directions	1	3	B	P1-14
		Member's attitude-change by observing progresses during change	1	3	B	P1-30
		Member's inspiration and motivation from their colleagues' devoting efforts	1	3	B	P2-8
Patient's trust and satisfaction		High satisfaction among patients	1	3	B	P1-8
		Patient's trust in service and staffs	1	3	C	P1-8
Member's Self-improvement		Member's self-improvement by learning from their partner	1	3	B	P1-23
		Member's self-improvement in expanding expertise	1	3	B	P3-16
		Member's self-improvement in efficiency	1	3	B	P3-17
		Member's self-improvement in novel ideas of work	1	3	B	P3-27

Regional Limitation		Lake of resident amount	2	3	C	P3-11
Disagreements caused by new system		Disagreements due to new appraisal system	2	3	A	P1-26
		Unreasonable personnel system	2	3	A	P3-12
		Decreased salary caused by new appraisal system	2	3	A	P3-12
Lack of government supports		Unfair government evaluations	2	3	A	P3-15
		Lack of matching policies to the reform policies from governmet level	2	3	A	P5-1
		Disaggrements due to salary and work load issues caused by the change	2	3	B	P3-2
Inadequate communication among members		Top-down communication style	2	3	B	P2-18
		Lack of communication among base-level members	2	3	C	P1-18
		Lack of self-improvement among base-level members	2	3	C	P2-8

Categories	Cover Terms	Included Terms	Attri	Case	Interview	Quote
Transformational Leadership	Leader's capacity	Leader's organizing capacity	1	4	A	P1-15
		Leader's implementing capacity	1	4	A	P1-17
		Leader's ability of exploring and designing the new path	1	4	A	P1-30
		Leader's ability of evaluating the effects of change	1	4	A	P2-5
		Leader's self-improvement in problem-solving skills	1	4	A	P4-28
		Leader's ability in solving problems during change	1	4	B	P1-17
		Leader's wild expertises	1	4	B	P1-19
		Leader's ability of discovering member's advantage	1	4	B	P1-23
	Leader's communication with members	Leader's well communication with members	1	4	A	P2-10
		Leader's information sharing with members	1	4	B	P1-15
		Leader's participation in base level tasks	1	4	B	P1-25
	Leader's awareness of change	Leader's awareness of change barriers among members	1	4	A	P2-22
		Leader's awareness of possible risks before implementing the change	1	4	A	P2-24
		Leader's clear understanding of change value	1	4	A	P2-28
		Leader's clear understanding of organization's responsibility	1	4	A	P3-6
		Leader's awareness of internal and external situations	1	4	A	P4-15
	Leader's consideration	Leader's consideration of mutual benefits for site, partner, and patients	1	4	A	P3-3
		Leader's confidence in successfully implementing the change	1	4	A	P4-24
	Leader's self-improvement	Leader's self-improvement in management skills	1	4	A	P4-27
	Leader's experience	Leader's working experience at clinical level	1	4	B	P1-21
	Leader's character	Leader's braveness of exploring a new path	1	4	B	P1-24
Strategic Planining	Site environment improvement	Improvement in internal site environment	1	4	A	P1-5
	Site service improvement	Improvement in service quality	1	4	A	P1-7
		Training opportunity for members about the change	1	4	B	P2-13
	Strategies in promoting the change	Evaluations for the change progress	1	4	A	P3-19
		Effective personnel adjustment during change	1	4	A	P3-25
		Evaluation report and recommendations of change implementation to upper-level government	1	4	A	P4-5
		Evaluation for each stage of change process	1	4	B	P1-29
		Mission adjustment at each stage of change	1	4	B	P2-15
		Exellent personnel assignment during change	1	4	B	P2-29
Member's consensus and abilities	Consensus on change value	Consensus on change value among members	1	4	A	P2-11
		Member's awareness on neccessity of change	1	4	A	P3-30
		Member's consensus on change value and neccessity	1	4	B	P2-20
	Consensus on career goal	Consensus on career goal and value among members	1	4	A	P2-13
		Member's clear understanding of work responsibility and value	1	4	B	P2-10
	Positive characters among members	High understanding between members during work	1	4	A	P4-9
		Member's culture cohesion	1	4	B	P1-20
		Member's confidence and motivation from observing progress	1	4	B	P1-32
		Member's friendly attitude when working with partner	1	4	C	P2-7
	Member's capacities	Member's team-working skills	1	4	B	P2-25
		Member's ability of undertaking heavier work load	1	4	B	P2-30
		Member's good communication skills with other organizations	1	4	C	P1-12
		Member's flexibility in exchanging tasks when necessary	1	4	C	P2-5
Communication among members		Regular meetings during change	1	4	A	P2-16
		Thematic meetings in promoting the change	1	4	A	P2-17
		Coordination between members at each stage of change	1	4	A	P3-16
		Change-related conferences at district, city, and province level step by step	1	4	A	P3-17
		Regular meetings during change	1	4	B	P1-28
		Regular recommendation collection from all members	1	4	B	P1-30
Structual change		Establishment of health reform office focusing on reform related changes	1	4	A	P3-22
		Establishment of medical reform office	1	4	B	P2-33
		Esrablishement of health policy department	1	4	B	P3-5
Partnership building	Investigation to partners	Pre-implementation research and investigation in related organizations	1	4	A	P3-10
		Investigation at subordinate organizations	1	4	B	P1-28
	Cooperation with partners	Experimental implementation in a subodinate site	1	4	A	P3-12
		Cooperation with subordinate organizations	1	4	C	P1-6
		Subordinate site member's awareness of change value and neccessity	1	4	C	P1-10
		Relationship building with subordinate organizations	1	4	C	P2-10
Trust	Trust between	High trust among members	1	4	A	P4-8

	members	Trustful relationship among members	1	4	B	P2-2
	Trust with partners	Trust between Subordinate sites and the organization	1	4	C	P1-18
Member's self-improvement		Member's self-improvement in understanding work responsibility and value	1	4	B	P3-6
		Member's self-improvement in expanding work area	1	4	B	P3-9
		Member's self-improvement in work efficiency	1	4	B	P3-10
		Member's self-improvement in cooperating with partner organization	1	4	B	P3-11
		Member's self-improvement in understanding the health reform policies	1	4	B	P3-15
		Member's self-improvement in health service skills	1	4	B	P3-18
Difficulties related to government		Financial issues due to inadequate government support	2	4	A	P3-27
		Difficulties related to unclear government existing and future policies	2	4	A	P3-32
		Difficutiles related to unreasonable compensation policy	2	4	A	P4-2
Difficulties related to management system		Imperfect management system	2	4	A	P4-20
Lack of communication between members		Lack of change process transparency to partner	2	4	C	P1-22

Categories	Cover Terms	Included Terms	Att	Case	Interview	Quote
Tranformational leadership	Leader's awareness of change	Leader's awareness of current internal situation	1	5	A	P1-12
		Leader's awareness of external condition	1	5	A	P1-15
		Leader's clear understanding of change benefits	1	5	A	P1-17
	Leader's consideration of change	Leader's consideration of mutual benefits for members and patients	1	5	A	P1-28
		Leader's awareness of change value	1	5	A	P2-25
	Leader's positive character	Leader's confidence of overcoming difficulties	1	5	A	P1-21
		Leader's considerate character in communicating with members	1	5	B	P2-6
	Leader's positive practice during change	Leader's efficient strategies in overcoming difficulties	1	5	A	P1-31
		Leader's comforting strategies to members during early stages of change	1	5	B	P1-27
		Leader's financial compensation for members	1	5	B	P1-28
	Leader's self-improvement through change	Leader's self-improvement in communication skills	1	5	A	P4-7
		Leader's self-improvement in problem-solving	1	5	A	P4-8
		Leader's self-improvement in management skills	1	5	A	P4-10
	Leader's skills in promoting the change	Leader's well communication with members during department meetings	1	5	B	P1-32
		Leader's problem-solving skills during change	1	5	B	P2-5
Useful Strategy during change	Financial improvement strategy	Financial adjustment during reform	1	5	A	P2-20
	Technical improvement strategy	Software application during change	1	5	B	P1-16
		Equipement improvement during change	1	5	B	P3-10
		Computer management system upgrade	1	5	B	P4-10
		Improvement in equipments	1	5	C	P1-9
	Social improvement strategy	Set of "Director's mail box" in collecting suggestions	1	5	B	P3-25
		Relationship building with patients	1	5	B	P2-26
		Online patient service system development	1	5	C	P1-14
	Service improvement strategy	Standardizing organizational operation during change	1	5	B	P1-11
		Clear internal regulations within organization	1	5	B	P3-18
		Improving health services during change	1	5	B	P3-3
		Traning opportunity for members to improve service	1	5	B	P3-5
		Improvement in Health services	1	5	C	P1-6
Communication among members		Well communication between members through regular meetings	1	5	A	P2-3
		Suggestions receiving through employee representative congress	1	5	A	P2-5
		Well communication between members through different level of meetings	1	5	B	P2-11
		Mid-level manager's guidiance to base-level members	1	5	B	P2-30
Trustful relationship		Trust between leader and members	1	5	A	P2-8
		Trust among members	1	5	B	P2-25
Shared value	Shared change value	Increasing understanding of change value among members	1	5	A	P2-12
		Member's consensus on change value	1	5	A	P3-11
		Member's clear understanding of change benefits	1	5	B	P1-3
	Shared work value	Same level of understanding among different level of members	1	5	B	P2-15
		Member's awareness of self-responsibility	1	5	B	P2-18
Member's value and skills	Member's positive character and skills	High efficiency in change implementation	1	5	A	P3-20
		Member's hard-working character	1	5	A	P2-16
		Member's flexibility in shifting working area	1	5	A	P3-7
		Member's ability in expanding work expertise	1	5	A	P3-8
		Member's high education background	1	5	A	P4-5
		Member's ability in team-working	1	5	B	P2-16
		Member's consideration of clients' benefits	1	5	B	P2-23

		Member's ability in adopting new system and environment	1	5	B	P4-20
		Well relationship between members	1	5	C	P1-13
	Consensus on change implementation	Member's clear understanding of change implementation process	1	5	B	P1-5
		Member's consensus on progress achieved	1	5	B	P1-22
		Member's objective view of change progress	1	5	B	P4-15
Structure change		Separation of management from handling	1	5	A	P1-10
		Establishement of health insurance reform office	1	5	A	P3-5
Member's self-improvement		Member's self-improvement in undersdanding upper-level health policy	1	5	B	P4-22
		Member's self-improvement in adoptive capacity	1	5	B	P4-25
		Member's self-improvement in expertise expanding	1	5	B	P4-27
Policy support from government		Detailed instruction of policy implementation from upper government	1	5	A	P3-25
Difficulties related to limited authority	Difficulties in designing change model	Leader's limited authority in designing change model	2	5	B	P1-25
	Difficulties in structure flexibility	Lack of structure flexibility due to authority limit	2	5	B	P4-7
Difficulties due to inadequate government		Inadequate policy supports from upper-level government	2	5	A	P1-5
		Financial crisis due to unresonalble upper-level policy	2	5	A	P2-27
		Lack of supporting policy from upper-level government	2	5	B	P3-15
Conflicts between members	Conflicts in self-profit	Conflicts between members with related responsibilities and opposite profits	2	5	A	P3-17
		Wage decreasing due to reform policy change	2	5	B	P1-8
		Wage decreasing due to appraisal system reform	2	5	A	P1-25
	Conflicts due to communication issue	Lack of trust between leader and base-level members	2	5	B	P3-22
Conflicts with patient		Increasing conflicts between doctors and patients due to policy change	2	5	A	P3-28
		Lack of trust between patients and organization	2	5	C	P2-5

Categories	Cover Terms	Included Terms	Attri	Case	Interv	Quote Link
Tranformational Leadership	Leader's ability towards change	Leader's ability of collecting related information before change	1	6	A	P1-7
		Leader's ability of cooperating with related organizations	1	6	A	P1-5
		Leader's strong communication capacity within the organization	1	6	A	P2-9
		Leader's well social skills in making friends with partner members	1	6	A	P5-15
	Leader's awareness of change	Leader's awareness of external condition	1	6	A	P1-6
		Leader's awareness of change barriers	1	6	A	P2-6
		Leader's detailed understanding of partner sites' condition	1	6	A	P5-25
		Leader's awareness of change benefits and value	1	6	A	P3-7
		Leader's clear understanding of organizational mission and responsibility	1	6	A	P4-3
	Leader's positive characters	Leader's confidence in change success	1	6	A	P1-7
		Leader's trust on members	1	6	A	P4-17
		Leader's braveness of exploring a new path	1	6	A	P5-14
		Leader's trustful relationship with members	1	6	B	P2-22
		Leader's encouragement to members through his hard-working	1	6	B	P2-23
	Leader's strategy to change	Leader's practices in visiting local community	1	6	A	P2-25
		Leader's information sharing from the government to members	1	6	A	P2-27
		Leader's well communication with partner leaders and members	1	6	B	P1-10
		Leader's practices in solving conflicts between members	1	6	B	P2-20
		Leader's participation in partner site's regular meetings	1	6	B	P3-15
	Leader's self-improving	Leader's self-improving in communication skills	1	6	A	P5-16
		Leader's self-improving in expanding expertise area	1	6	A	P6-3
		Leader's self-improving in management skills	1	6	A	P6-5
		Leader's negotiation with upper level government in promoting the change	1	6	A	P6-6
Partnership Development	Relationship building with partners	Relationship building with related organizations	1	6	A	P1-13
		Successfully overcoming the wearin process with partners	1	6	B	P1-20
	Plan developing with partners	Development of partnership with related organizations	1	6	A	P1-32
	Partnership strategy	Establishment of reform committee with multiple sites involved	1	6	A	P4-5
		Client data information collection from partner sites	1	6	B	P3-25
		Publicizing change content to local residents	1	6	A	P1-28
Strategies during change	Cooperation with external parties	Negotiation with local police office in cooperating the change	1	6	A	P1-16
	Establishement of new funtional department	Establishment of doctor teams	1	6	A	P2-2
		Establishment of new departments focusing on different treatment	1	6	A	P3-14
	Personnel system strategy	Recruitment of new professional members	1	6	A	P2-23
		Training opportunity to members in improving health service	1	6	A	P5-8
		Training opportunity to members in improving communciation skills	1	6	A	P5-10
	Standardization	New internal regulations regarding the change	1	6	A	P2-7
		Standardization on organizational operation	1	6	B	P1-19
		Improvement in internal environment and equipment	1	6	C	P1-24
	Culture development	Culture development by spreading culture cohesion handbook	1	6	A	P4-17
	Chang publicizing	Breif presentation for community residents (clients) about the change	1	6	B	P3-21
		Flyer spreading by partner organizations to residents about the change	1	6	B	P3-14
	Change plan development	Detailed plan of each stage of change before implementation	1	6	B	P3-15
	Community activity to recruit clients	Lecture on various health topics provided to local residents	1	6	B	P3-6
		One-on-one health consulting provided to local residents when needed	1	6	B	P3-3
		Establishment of health file for local resident	1	6	C	P1-22
Communication among members		Communication through regular meetings	1	6	A	P3-30
		Unblocked communication path with each level of members	1	6	A	P3-4
		Weekly mid-level manager meeting in reflecting problems	1	6	A	P3-25
Awareness of change value and	Change value and benefit consensus	Member's consensus on change value	1	6	A	P3-6
		Member's consensus on change value	1	6	B	P2-27

content	Awareness of change among members	Member's undersdanding on change content and process	1	6	A	P3-10
		Member's understanding of long accepting period for residents	1	6	B	P1-17
		Member's agreement on change progress	1	6	B	P2-15
		Member's awareness of strength and weakness of partner sites	1	6	B	P3-23
Member's positive character and ability		Member's highly professional work capacity	1	6	B	P4-5
		Member's character of responsible for work	1	6	A	P4-29
		Member's familarity to targeted residents (clients)	1	6	A	P5-6
		Member's good teamwork with partner members	1	6	B	P1-28
		Member's confidence in overcoming difficulties through change	1	6	B	P1-14
		Doctor teams' cooperation with each other during the change	1	6	B	P2-24
		Member's acceptance to increasing work load due to the change	1	6	B	P4-26
		Member's increasing stress due to multi-tasks during change	1	6	B	P4-15
Internal and external trust	Trust among members	Member's trustful relationship with each other	1	6	A	P4-20
		Member's trustful relationship with each other during work	1	6	B	P4-7
	Trust between organization and clients	Good reputation of organization among local residents	1	6	C	P2-13
		Trust building with residents (clients) through communication	1	6	B	P1-3
		Residents (patients)' trust on organization	1	6	C	P1-3
	Trust with partner	Trustful relationships between organization and partner sites	1	6	C	P2-23
Member's self-improvement		Member's self-improving in communication skills	1	6	B	P4-22
		Member's self-improving in management skills	1	6	B	P4-24
		Member's self-improving in expertise and health service	1	6	B	P4-27
		Member's self-improving in problem-solving skills	1	6	B	P4-28
		Member's self-improving in team-work ability	1	6	B	P4-25
Limitation and difficulty	Authority limitation	Inadequate amount of members dure to limited recruitment authority	2	6	A	P2-12
		Inadequate human resource dure to limited recruitment authority	2	6	B	P4-8
	External nagetive change	Change of leaders in partner organizations	2	6	A	P3-26
		Inconsistent data information from upper government and other sites	2	6	B	P3-29
	Disagreement on change value	Imbalance acknowledge of change due to top-down information spreading method	2	6	B	P2-14
		Little acknowledge of change among members who are "unrelated"	2	6	B	P2-19

Categories	Cover Terms	Included Terms	Attribu	Case Nu	Interviev	Quote Link
Change advantages in Leadership	Leader's awareness of change	Leader's clear awareness of health condition of local residents	1	7	A	P1-8
		Leader's full understanding of upper government policy	1	7	A	P1-22
		Leader's awareness of potential risk of change	1	7	A	P4-18
	Leader's positive strategy of change	Leader's efforts in calming internal complaints	1	7	A	P4-5
		Leader's culture cohension education to members through communication	1	7	A	P4-10
		Leader's positive communication with partner sites	1	7	B	P2-6
	Leader's self-improving	Leader's self-improving in medical knowledge	1	7	A	P5-5
		Leader's self-improving in communication skills	1	7	A	P5-7
		Leader's self-improving in expanding expertise	1	7	A	P5-8
		Leader's self-improving in reseach study skills	1	7	A	P5-11
	Leader's ability	Leader's ability in organizing community activities	1	7	C	P1-15
		Leader's well personal relationship with long-term patients	1	7	C	P2-6
Member's advantages in promoting the change	Member's positive character	Member's willingness of working in this area	1	7	A	P1-15
		Member's patience among patients	1	7	C	P1-5
	Member's ability	Member's ability in working under multi-task situation	1	7	B	P2-15
		Harmonious working status among members	1	7	B	P3-15
	Member's communication	Member's well internal communication	1	7	A	P3-6
		Brain-storming during meetings to overcome difficulties	1	7	A	P3-30
		Establishment of information platform by sending short-message to clients	1	7	B	P3-8
Positive strategies of change		Partnership with community committee	1	7	A	P2-30
		Positive participation in community activities	1	7	C	P2-10
		Regular telephone visit to high-risk families	1	7	A	P1-24
		Flyers and poster spreading to local residents	1	7	A	P2-16
		Presentations of health services provided to residents	1	7	A	P2-25
		Data collection by home-visit to residents	1	7	B	P1-15
		Improvement in medicine species	1	7	C	P2-3
Trust		Trustful relationship among members	1	7	A	P3-20
		Trustful relationship between members and leader	1	7	B	P2-12
Member's self-learning		Member's self-learning in communication skills	1	7	B	P4-5
		Member's self-learning in expertise development	1	7	B	P4-11
Resident's unacceptance	Unacceptance in change	Resident's unacceptance of change	2	7	A	P1-3
		Resident's misunderstanding by unclarified health service change	2	7	A	P2-22
		Client's law complaints due to reformed health services	2	7	B	P3-20
		Local resident's disagreement in change value and benefit	2	7	C	P2-22
		Lost of clients due to disconnected contact	2	7	B	P1-25
	Misunderstanding of organization	Resident's unfamiliarity in organizational change	2	7	C	P1-10
Increased work load		Increasing work load due to the change	2	7	A	P1-4
Leader's limitation	Leader's ability limits	Leader's increasing pressure due to difficulties of change	2	7	A	P3-15
		Leader's lack of education experience (high school)	2	7	A	P5-10
		Leader's unprofessional management experience	2	7	A	P1-6
	Leader's misunderstanding of change	Leader's uncomprehension of change value	2	7	A	P1-25
	Leader's mistrust	Leader's mistrust to upper-level policy-maker	2	7	A	P2-8
External patient barriers		Increasing patient amount due to the larger reform	2	7	A	P1-7
		Lack of trust from local residents to the organization	2	7	A	P2-5
		Lost of clients due to stronger hospitals nearby	2	7	B	P2-1
Lack of resource	Lack of staff	Lack of professional medical staff within the organization	2	7	A	P1-13
	Lack of authority	Unreasonable structure system due to limited amount of members	2	7	A	P4-15
		Difficulty in structure change sue to authority limitation	2	7	B	P3-5
	Lack of equipement	Lack of advanced health care equipment	2	7	B	P2-3
	Lack of policy supports	Lack of supportive policies from upper-level government	2	7	A	P2-10
		Incomplete policy from upper government	2	7	B	P2-8

Member's disagreement on change value		Member's diverse acceptance of change	2	7	A	P3-10
		Disagreements of change value among members	2	7	A	P3-27
		Member's uncomprehension of change value	2	7	B	P2-27
		Member's nagetive attitude towards the change	2	7	B	P3-26
		Member's doubt about change benefit	2	7	B	P3-31
Member's self-limitation		Member's lack of communciation skills with residents	2	7	A	P3-17
		Lack of problem-solving skills among members	2	7	A	P3-22
		Member's stressful situation due to supervision from above	2	7	B	P1-8
		Member's limited awareness on organiational responsibility	2	7	B	P2-30
		Member's limit in self-learning	2	7	B	P4-6
Lack of motivation		Member's lack of motivation due to unreasonable appraisal system	2	7	A	P1-10
		Member's complaints on difficulties due to the change	2	7	B	P1-5
Internal system limitation	Work assignment issue	Unclassified work responsibility among members	2	7	A	P2-13
	Appraisal system issue	Member's lack of motivation due to unreasonable appraisal system	2	7	A	P1-10
	Struture system issue	Unreasonable structure system due to limited amount of members	2	7	A	P4-15
		Difficulty in structure change sue to authority limitation	2	7	B	P3-5
Distrust relationship		Difficulties in gaining trust from residents	2	7	B	P1-7
		Local resident's limited understanding of organizational mission	2	7	C	P2-15

Categories	Cover Terms	Included Terms	Attrib	Case N	Inter	Quote Link
Leader's Advantages in promoting the change	Leader's awareness of change	Leader's awareness of change barrier	1	8	A	P1-5
		Leader's awareness of change value and benefit	1	8	A	P1-8
	Leader's negotiation with upper government	Leader's negotiation with upper government about recruitment	1	8	A	P2-1
	Leader's self-improvement	Leader's self-improvement in communication	1	8	A	P6-3
		Leader's self-improvement in knowledge expanding	1	8	A	P6-4
	Leader's positive attempting in change	Leader's attempt in developing new reform model	1	8	B	P3-5
		Leader's positive attitude in implementing the change	1	8	B	P3-6
	Leader's rich experience	Leader's rich experience in reform impelementation	1	8	B	P3-10
		Leader's training experience abroad in Australia about this change	1	8	B	P3-15
Change implementation strategies	Cooperation with subordinate sites	Financial support to subordinate sites	1	8	C	P1-10
		Management and arrangement to subordinate sites	1	8	A	P1-14
		Improvement of health service in subordinate sites	1	8	A	P1-22
		Well communication with subordinate sites	1	8	A	P4-12
		Improvement of better work environment in subordinate sites	1	8	B	P2-17
	Progress sharing with other sites	Reporting presentation in other related sites	1	8	B	P3-2
	Communication with patient	Suggestion box provided to patient	1	8	B	P4-10
Financial support from upper government		Financial support from upper government	1	8	A	P1-17
Member's strength in promoting the change	Member's awareness of change value and benefit	Member's consensus on change value	1	8	A	P2-17
		Member's awareness of organziational development direction	1	8	B	P2-17
	Communiaction among members	Well communication among members	1	8	A	P5-5
	Member's awareness of change barrier	Member's awareness in external condition	1	8	B	P1-5
		Member's awareness of change barrier	1	8	B	P2-12
		Member's awareness of long-term change period	1	8	B	P2-22
	Member's self-omprovement	Member's self-improving in social skills	1	8	B	P4-19
		Member's self-improving in management skills	1	8	B	P4-22
		Member's self-improving in knowledge expanding	1	8	B	P4-23
		Member's self-improving in shifting work responsibility	1	8	B	P4-24
Organization's positive characters	Trusful relationship	Trustful relationship among members	1	8	A	P5-13
		Trustful relationship between members and leader	1	8	B	P4-1
	Clear deployment	Clear task deployment in each department	1	8	B	P3-20
	Culture Cohesion	Good culture of cohesion	1	8	B	P3-25
Member's limitation	Lack of skills	Lack of skills among medical service members	2	8	C	P1-14
		Low medical service ability among members	2	8	B	P1-25
	Member's negative characters	Member's complaints on low wage	2	8	B	P1-19
		Member's lack of confidence in successful change	2	8	B	P2-3
		Member's compromise on disagreement	2	8	B	P4-7
		Member's complaints on heavy work load	2	8	B	P4-17
	Lack of transparency among members	Member's unfamilarity of change content	2	8	B	P1-28
		Mid-manager's pressure in communicating with leader	2	8	B	P4-4
		Base-level member's limited awareness of auditing system	2	8	B	P4-11
	Disagreement on change value	Base-level member's disagreement on change value	2	8	B	P1-30
Issues related to upper-government	Upper policy issue	Deficient upper health reform policy	2	8	C	P2-5
		Lack of positive insurance policy from government	2	8	B	P1-22
	Lack of adequate authority	Authority limit to recruit more member	2	8	A	P1-23

	Inefficiency in upper government	Long request processing time in upper government	2	8	A	P2-7
	Lack of government support	Lack of supporting policy from upper government	2	8	A	P1-11
		Lack of financial support	2	8	A	P3-6
		Lack of upper government support in publicazing the change	2	8	B	P1-8
Leader's limitation	Leader's negative character	Leader's pursuance in organizational development	2	8	C	P2-11
		Leader's lack of confidence of successful change	2	8	A	P1-7
	Leader's unclearness of responsibility	Leader's limited understanding about self-responsibility	2	8	A	P2-10
	Leader's lack of skills	Leader's low problem-solving skills	2	8	A	P5-22
Structure inflexibility	Lack of structure flexibility	Lack of flexibility in structure improvement	2	8	C	P2-12
		Inflexibility of structure change	2	8	A	P3-25
	Unreasonable structure system	Complicated structure and personal system (6 directors)	2	8	A	P2-11
		Unreasonable internal structure system	2	8	B	P1-31
Lack of resources		Lack of health service equipement	2	8	A	P2-29
		Lack of technical improvement in informationization	2	8	A	P3-17
Inadequate benefits to members	Increasing work load during change	Member's difficult work condition with multi-task	2	8	A	P4-8
	Unreasonable appraisal system	Decreasing motivation due to wage reduced by new appraisal system	2	8	A	P4-28
	Lack of training	Lack of training opportunity to members	2	8	B	P1-13
Deployment issue	Lack of change implementation plan	Lack of detailed plan and strategy of change implementation	2	8	A	P5-9
Lack of communication and transparency	Lack of transparency	Resident's unfamilarity of change content and value	2	8	B	P1-9
		Member's unfamilarity of change content	2	8	B	P1-28
		Mid-manager's pressure in communicating with leader	2	8	B	P4-4
		Base-level member's limited awareness of auditing system	2	8	B	P4-11
		Lack of transparency in inadequate information sharing about change	2	8	B	P3-22
		Lack of communciation path between leader and base-level member	2	8	B	P4-3
	Lack of communication with local residents	Untrustful relationship with local resident	2	8	B	P2-9
		Lack of publicizing of change value and organizational mission	2	8	B	P2-11
External barriers		Decreasing amount of new graduates from medical university	2	8	A	P1-27
		Resident's traditional hospitalization habit	2	8	B	P1-17
		Low-income living status in this district	2	8	B	P3-16

Categories	Cover Terms	Included Terms	Attri	Cas	Inte	Quote
Change advantage in Leadership	Leader's awareness of change	Leader's awareness of external condition	1	9	A	P1-3
		Leader's clear understanding of change content	1	9	A	P1-3
		Leader's awareness of change value and benefit	1	9	A	P1-24
	Leader's positive character and ability	Leader's acknowledgement of external board member's effort	1	9	A	P2-2
		Leader's detailed explanation of change to members	1	9	A	P2-8
		Leader's high problem-soving ability	1	9	A	P5-13
		Leader's well communciation with mid-level manager	1	9	B	P1-30
		Leader's positive attitude towards change implementation	1	9	B	P2-17
	Leader's self-improvement	Leader's self-learning from external board members	1	9	A	P2-5
		Leader's self-improving in management skills	1	9	A	P5-21
Efficient change implementation strategy	Establishement of change-related board	Establishement of governing borad	1	9	A	P1-4
	Internal Institutional reform	Management system reform	1	9	A	P1-5
		Release of reform-related new regulations	1	9	B	P3-20
		Separation of management from handling	1	9	C	P1-13
	Communication among members	Meetings aim at studying the reform policy	1	9	A	P1-6
	Performance assessment	Performance assessment to mid-level manager	1	9	A	P3-15
	Cooperation with partners	External board member's participation in general meetings	1	9	B	P3-5
		Well communciation between internal and external board members	1	9	B	P3-11
		Positive response and improvement based on external member's suggestion	1	9	C	P1-15
		External board member's clear understanding of change value	1	9	C	P1-20
		Brain-storming during governing board meetings	1	9	C	P1-21
Communication among members		Regular meeting among members	1	9	A	P3-12
		Well communication among members during work	1	9	B	P3-19
Trust among members		Trustful relationship among members	1	9	A	P4-30
		Trustful relationship among members during work	1	9	B	P4-12
Member's change-promoting advantege	Member's self-improvement	Member's visit-learning tour to other similar sites	1	9	B	P4-8
		Member's self-improving in expanding expertise	1	9	B	P4-25
		Member's self-improving in increasing knowledge	1	9	B	P5-6
		Member's self-improving in understanding policy	1	9	B	P5-7
	Mid-level mnager's understanding of change	Mid-level manager's familarity in original change plan	1	9	B	P2-25
Member's disadvantage about change	Member's self-limitation	Lack of change motivation among members	2	9	A	P1-9
		Member's lack of confidence in successful change	2	9	A	P2-32
		Misunderstanding of leader's decision-making capacity among members	2	9	A	P5-10
	Member's different values	Disagreement of change value among members	2	9	A	P2-22
		Different value of work among different level of member	2	9	A	P3-24
		Disagreement of change implementation among members	2	9	A	P5-3
		Member's doubt on change value and benefit	2	9	B	P1-20
	Lack of adequate attetion of change among members	Lack of attention in change from base-level member	2	9	A	P3-25
Lack of tranparency		Base-level member's unfamilarity in change content and value	2	9	B	P2-26
		Member's unclearness of each leader's responsibility	2	9	B	P4-6
		Lack of transparency in change information sharing among members	2	9	C	P2-10
Obstacles related to upper-level government	Lack of government support during change	Government's inadequate research on change policy before release	2	9	A	P1-13
		Inadequate supporting policy from upper government	2	9	A	P1-20
		Little attention from upper government	2	9	A	P2-13
	Lack of guidiance	Lack of government guidiance and publicizing	2	9	A	P3-10
		Lack of progress tracking from upper-government	2	9	A	P3-18
	Unclearness of reform policy	Unclear change policy from upper government	2	9	A	P3-16
		Different opinions among upper-level government leaders	2	9	A	P3-31

		Imperfect upper-level reform policy	2	9	C	P2-7
	Inefficient reform process	Slow reform process at upper-government	2	9	A	P3-28
		Government's inadequate promoting power on this change	2	9	B	P1-7
	Government system change	Upper-level government system change	2	9	A	P4-1
	Lack of empowerment	Leader's limited management authority	2	9	B	P2-21
		Limited authority of governing board due to lack of upper-government enpowerment	2	9	B	P1-5
Internal institutional issues	Unreasonable change implementation	Governing board's lack of management authority due to old system	2	9	A	P2-12
		Unreasonable establishing process of governing board	2	9	A	P4-9
		Lack of internal and external supervision of change	2	9	B	P3-27
	Problematic internal structure system	Unclear responsibility deployment among leaders	2	9	B	P1-29
		Complicated internal structure system	2	9	A	P4-13
		Inefficient internal structure change	2	9	B	P2-10
		Unreasonable internal apponitment system	2	9	B	P3-30
		Unreasonable internal personnel system	2	9	B	P4-11
	Difficulty in structure improvement	Inflexibility of structure change due to limited authority	2	9	A	P4-29
	Untrustful relationship with clients	Untrustful relationship with clients	2	9	B	P4-17
Leader's self-limitation	Leader's lack of awareness about change	Leader's unclearness of member's change barrier	2	9	A	P2-25
	Leader's lack of ability	Leader's lack of motivation due to unclear governmental direction	2	9	A	P4-3
		Leader's inadequate communication to upper-level government	2	9	A	P5-19
		Leader's low self-learning ability	2	9	A	P5-23
		Leader's lack of ability in exploring unique path of change	2	9	B	P1-25
		Leader's lack of management skills	2	9	B	P2-5

Categories	Cover Terms	Included Terms	Attr	Case	Interv	Quote
Leader's advantage towards change	Leader's awareness of change	Leader's awareness of change barrier	1	10	A	P1-2
	Leader's positive character	Leader's practical character during regular work	1	10	A	P3-10
		Leader's support and acceptance of member's suggestion	1	10	B	P3-28
	Leader's self-improvement	Leader's self-improving in understanding upper policy	1	10	A	P5-2
		Leader's self-improving in expanding expertise	1	10	A	P5-9
		Leader's self-improving in problem solving ability	1	10	A	P5-10
	Leader's ability and skills	Leader's ability of leading organizational development	1	10	B	P2-17
		Leader's communication with members in daily work	1	10	B	P2-24
Member's advantage toawrds change	Communication among members	Well communication among members during work	1	10	A	P1-18
		Well communication between base-level members and mid-level managers	1	10	B	P3-21
	Member's positive character and skills	Rich medical experience among members	1	10	A	P1-26
		Manage-level member's supervision on base-level members	1	10	A	P3-1
		Member's patience while treating patients	1	10	C	P1-8
		Trustful relationship between members and patients	1	10	C	P2-1
		Good team-work among members during medical service	1	10	C	P2-12
		Old member's guidiance and teaching to new members	1	10	C	P2-19
		Member's familiarity of upper-level reform policy	1	10	B	P1-19
		Member's self-improving in working ability	1	10	B	P5-29
	Trust among members	Trustful relationship among members	1	10	A	P3-2
		Trustful relationship between mid-level managers and base-level members	1	10	B	P5-12
Positive strategies of change		Regular meetings among members	1	10	C	P1-4
		Well medical service to patients	1	10	C	P1-6
		Training to members in larger hospitals	1	10	C	P1-23
		Patient's satisfaction form	1	10	B	P1-3
Organizational reputation		Good reputation of this hospital among local residents	1	10	C	P2-26
Leader's limitation that obstruct the change	Leader's lack of ability	Leader's lack of ability in designing unique reform path	2	10	A	P1-6
		Leader's lack of management experience	2	10	A	P1-8
		Leader's lack of ability in negotiating with upper-level government	2	10	A	P2-15
		Leader's lack of ability in motivating members	2	10	A	P3-21
		Leader's lack of problem-solving skills	2	10	A	P4-10
		Leader's low problem-solving skills	2	10	B	P3-18
	Leader's doubt in change value	Leader's doubt in change value	2	10	A	P2-7
		Leader's doubt in change benefit	2	10	A	P2-17
	Leader's lack of communication with upper-level government	Leader's compromise to upper-level government	2	10	A	P3-15
	Leader's limited communication with members	Leader's limited notification about current change to members	2	10	B	P3-6
	Leader's overcontrol to members	Leader's overcontrol to member's mind and action	2	10	B	P6-9
Internal system problems		Unreasonable upper-level apprisal system reform policy	2	10	A	P1-5
		Unpractical appraisal system reform strategy	2	10	A	P1-22
		Inflexibility of structure change	2	10	A	P2-26
		Inadequate amount of employee	2	10	B	P2-2
Deficient implementation process		Lack of detailed implementation plan	2	10	A	P1-9
		Lack of efforts in implementing the change	2	10	A	P1-12
		Inefficient changing process	2	10	A	P1-15
		Lack of implementation power of the change	2	10	B	P1-25
		Unclear deployment of individual responsibility	2	10	B	P1-31
		Unclear change implementation plan and steps	2	10	B	P5-15
		Lack of problem-solving strategy	2	10	B	P5-17
Communication issue among members	Lack of transparency	Little information sharing about change value and implementation	2	10	A	P1-23
		Member's unfamiliarity of content and value of current change	2	10	B	P3-8
		Lack of tranparency in change process among base-level members	2	10	B	P4-16
	Ineffective communciation style	Top-down communicating style during change	2	10	A	P1-28

		Lack of communication with base-level members about the change	2	10	A	P4-19
		Top-down communicating style during change	2	10	B	P3-11
		Local-level member's complaint about change barrier	2	10	B	P4-21
Member's limitation that obstruct the change	Member's self limitation	Member's lack of self-improvement	2	10	B	P6-6
		Member's compromise and excessive obedience	2	10	B	P6-12
	Member's disagreements about change	Disagreement on change value among members	2	10	A	P2-2
		Member's disagreements on change value	2	10	B	P2-9
		Member's doubt on change value	2	10	B	P4-8
Financial difficulties		Wage reducing due to the change	2	10	A	P2-6
		Lack of environment improvement due to financial limit	2	10	C	P1-15
		Decreasing wage due to the change	2	10	B	P2-16
		Financial difficulty during the change	2	10	B	P4-2
Lack of upper-level government support	Lack of policy support	Lack of government supporting policy	2	10	A	P4-14
	Lack of financial support	Lack of financial support from upper government	2	10	A	P4-15
		Lack of financial support from upper government	2	10	B	P4-3
	Lack of empowerment	Inflexibility of structure change due to authority limit	2	10	B	P5-25
External barrier		Low-income clients in this area	2	10	C	P2-5
		Small amount of local residents	2	10	B	P1-5

Categories	Cover Terms	Included Terms	Attr	Case	Interv	Quote
Leadership advantage towards the change	Leader's awareness of organization	Leader's awareness of organizational mission	1	11	A	P1-2
	Leader's awareness of change	Leader's awareness of change barrier	1	11	A	P1-6
		Leader's awareness of change value	1	11	A	P6-3
	Leader's positive character and skills	Leader's familiarity of upper-level reform policy	1	11	A	P1-10
		Leader's self-improving in management skills	1	11	A	P6-30
Member's advantage towards the change	Trust among members	Trustful relationship among members	1	11	A	P6-13
		Mid-level manager's guidiance to base-level members	1	11	A	P6-14
	Trust between members and leader	Member's trust and respect to leader	1	11	B	P1-16
	Member's positive ability	Well team-work ability among members	1	11	B	P2-23
		Member's self-improving in communication skills	1	11	B	P3-4
Effective strategy during change	Inner communication	Quarterly meetings about major tasks	1	11	A	P6-18
		Regular meeting every week	1	11	B	P2-2
	Cooperation with subordinate sites	Financial support to subordinate sites	1	11	B	P1-15
		Well communciation with subordinate organizations	1	11	B	P1-19
		Trustful relationship with subordinate sites	1	11	C	P1-6
	Clear task deployment	Clear deployment in different departments in daily work	1	11	B	P2-8
Positive experience		Previous successful health reform experiences	1	11	B	P3-13
Leader's limitation that obstruct the change	Leader's negative character	Leader's lack of motivation due to wage limit	2	11	A	P4-31
		Leader's over-dependence to upper-level government	2	11	A	P5-6
		Leader's unwillingness of sharing change information to members	2	11	A	P5-28
	Leader's lack of ability	Leader's lack of ability in designing change implementation plan	2	11	A	P5-3
		Leader's lack of management experience	2	11	A	P7-5
		Leader's lack of self-improvement	2	11	A	P7-7
		Leader's lack of ability in exploring unique path of change	2	11	C	P2-6
		Leader's lack of conflict solving skills	2	11	A	P6-25
	Leader's lack of communication	Leader's unwillingness of sharing change information to members	2	11	A	P5-28
		Leader's lack of communication with members	2	11	A	P6-7
	Leader's unawareness of responsibility	Leader's unclearness of self-resonsibility	2	11	A	P5-31
Upper-government issue	Low efficiency in upper-level government	Largo request processing time in upper-level government	2	11	A	P2-20
	Unclear and unreasonable policy	Unclear evaluation system of upper-level policy	2	11	A	P3-5
		Inadequate local area investigation from policy-makers	2	11	A	P3-15
		Unreasonable upper-level reform policy	2	11	A	P4-16
		Lack of supporting policy from upper-government	2	11	C	P2-1
	Lack of government support	Lack of government financial support	2	11	A	P4-18
		Lack of supporting policy from upper-government	2	11	C	P2-1
	Over-control from upper government	Upper-level government's over control	2	11	B	P1-26
Internal system problem	Personnel system issue	Member's heavy work load	2	11	A	P5-21
		Inadequate amount of members	2	11	A	P2-24
		Lack of training opportunity in larger sites or cities	2	11	C	P1-18
		Unreasonable personnel appraisal system	2	11	C	P1-25
	Structure system issue	Inflexiblility in structure change due to authority limit	2	11	A	P5-15
Inefficient implementation process	Unclear planning	Lack of detailed implementation plan	2	11	A	P4-27
		Inadequate implementation power to the change	2	11	B	P2-13
	Lack of member's involvement	Few member involvement in change process	2	11	A	P6-28
	Lack of communciation with external sites	Few negotiation with upper-level government	2	11	B	P1-6
		Low awareness of change in subordinate sites	2	11	C	P1-15
Member's limitation that obstruct the change	Member's negative character	Lack of change motivation among members	2	11	A	P3-17
		Member's compromise to upper-level decisions	2	11	B	P3-1
	Lack of ability	Disparity of ability among members	2	11	A	P5-11
		Member's lack of self-improvement	2	11	B	P3-3
		Member's lack of creativity and questioning in work	2	11	B	P3-14
	Unawareness of change	Member's doubts in change value	2	11	B	P1-4
	value	Disagreements on change value among members	2	11	B	P2-17
Lack of transparency about change		Lack of transparency about change to members	2	11	A	P5-7
		Member's unfamiliarity about change content	2	11	A	P5-9
		Little notification for members about the change	2	11	A	P5-26
		Top-down communication style	2	11	A	P6-21
		Member's unclearness in change content and value	2	11	B	P1-3
		Member's unclearness of internal structure change	2	11	B	P2-22
		Few communciation between different departments	2	11	B	P3-10
		Member's low awareness of leader's reform plan	2	11	C	P1-3

Categories	Cover Terms	Included Terms	Attri	Case	Interview	Quote
Leader's positive character		Leader's awareness of change barrier	1	12	A	P3-18
		Leader's consideration and support to members	1	12	B	P4-5
Internal system advantages	Useful strategy to residents	Free health lecture to local residents	1	12	A	P1-30
		Free gifts to residents while signing up for service	1	12	A	P2-5
		Home-visiting to local residents	1	12	B	P2-19
		Free vaccine service to local residents	1	12	B	P3-19
		Free physical exam to local residents	1	12	B	P3-22
		File development to local residents	1	12	C	P2-9
		Successful implementation of health insurance reform	1	12	C	P2-10
	Member improvement strategy	Training opportunity in other related sites	1	12	A	P3-6
		Newly recruiting members	1	12	B	P3-16
	Partner cooperation	Cooperation with local community committee	1	12	B	P3-20
	Internal resource	Adequate medicine storage	1	12	C	P1-3
Member's advanrage towards the change	Well relationship among members	Regular meeting every week	1	12	A	P3-2
		Trustful relationship among members	1	12	A	P4-6
		Mid-level manager's well communciation with base-level members	1	12	B	P5-3
	Member's ability and awareness	Member's awareness of own responsibility	1	12	B	P3-17
		Flexible work-shift among members	1	12	B	P3-27
		Well team-work among members	1	12	B	P4-1
		Member's awareness of change barrier	1	12	B	P4-7
		Member's warm attitude to patients	1	12	C	P1-4
	Member's self-improvement	Member's self-improving in health service ability	1	12	B	P5-6
		Member's self-improving in leadership ability	1	12	B	P5-7
		Member's self-improving in communication skills	1	12	B	P5-9
		Member's self-improving in expanding expertise	1	12	B	P5-13
Upper-level government evaluation		Evaluation from upper-level government	1	12	B	P3-8
Leader's limitations that obstruct the change	Leader's lack of awareness	Leader's narrow view of organizational development	2	12	A	P1-3
		Leader's doubt of future reform success	2	12	A	P1-5
		Leader's unawareness of change value	2	12	A	P1-16
		Leader's disagreement on change benefit	2	12	A	P3-9
		Leader's low attention to the change	2	12	B	P2-10
	Leader's lack of ability	Leader's lack of problem-solving ability	2	12	A	P1-25
		Leader's lack of self-improvement	2	12	A	P4-7
		Leader's low promotion power to the change	2	12	B	P2-5
		Leader's lack of ability in exploring unique path	2	12	B	P2-24
		Leader's lack of management experience	2	12	B	P4-27
	Leader's negative character	Leader's hard request to members	2	12	A	P2-17
		Leader's low participation in change process	2	12	A	P2-19
	Leader's lack of communciation	Leader's few communciation with upper-level government	2	12	A	P2-21
Member's limitation towards the change	Member's lack of ability	Low level of health care service	2	12	A	P1-12
		Low level of member's professional ability	2	12	A	P1-15
	Member's unawareness about change	Disagreements about change value among base-level members	2	12	A	P4-3
		Member's unawareness of change benefit	2	12	B	P1-20
		Member's unclearness about change content and value	2	12	B	P2-12
		Member's unawareness of organizational responsibility	2	12	B	P4-18
Nonacceptance of change among residents	Local resident's refusion of change	Local resident's nonacceptance of change	2	12	A	P1-22
		Local resident's refusion to member's service	2	12	B	P4-8
		Ineffective strategy in communicating with local residents	2	12	B	P4-15
	Untrustful relationship with residents	Local resident's low respect to members	2	12	A	P2-6
		Local resident's distrust to organization	2	12	B	P1-18
Upper-government issue	Lack of government resource support	Lack of government financial support	2	12	A	P3-7
		Lack of government publicizing about the change	2	12	A	P3-25
		Lack of government supporting policy	2	12	B	P2-17
		Lack of change promoting power from upper-level government	2	12	B	P2-30
	Lack of empowerment	Over-obey to upper-level government	2	12	B	P2-25
Internal system issue	Lack of competitive power	Lack of competitive power with other sites nearby	2	12	B	P1-25
		Low medical service ability compare to larger hospitals	2	12	C	P1-15
	Unreasonable personnel system	Complicated personnal system	2	12	A	P4-2
		Lack of manpower	2	12	B	P1-13
		Lack of manpower	2	12	C	P2-2
		Member's heavy work load	2	12	C	P2-15
	Unsatisfied working environment	Small office place	2	12	B	P4-25
Inefficient change process		Inefficient implementation process	2	12	B	P1-4
		Unclear change plan	2	12	B	P1-6
		Lack of publicizing strategy	2	12	C	P2-13
External local resident issue		Local resident's low educational level	2	12	A	P2-8
		Small amount of patient	2	12	B	P1-24
		Local resident's low-income status	2	12	C	P1-6
		Population mobility among local area	2	12	C	P1-10

Xueyin Zhao
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Curriculum Vitae

EDUCATION

School of Public Health, Indiana University Bloomington, Bloomington, IN
Ph. D. in Health Behavior
2010-2015
Area of Concentration: Health policy, Health reform, Organizational change

School of Public Health, Indiana University Bloomington, Bloomington, IN
M.S. in Health Promotion
2009-2010
Area of Concentration: Youth risk behavior change, community health

China Youth University for Political Sciences, Beijing, China
B.L. in Ideological and Political Education
2005-2009
Area of Concentration: Political science, youth risk behavior, youth sexual education

TEACHING EXPERIENCE

School of Public Health, Indiana University Bloomington, Bloomington, IN
Associate Instructor
2012-2014

SPH-H180 Stress Management and Prevention
This course exposes students to a holistic approach to stress management. It treats both cognitive (coping) skills and relaxation techniques with the intention of preventing and alleviating the physical symptoms of stress.

- Four semesters, average 74 students per semester
- Successfully created & implemented undergraduate course curriculum on Stress Management and Prevention
- Applied organizational and leadership skills to maintain Doctoral student and candidate responsibilities while also managing 80-student classroom
- Provided evaluation of student work, tutorials, and office hours

School of Public Health, Indiana University Bloomington, Bloomington, IN
Teaching Assistant

SPH-F255 Human Sexuality
2014

- Assisted the instructor in maintaining healthy classroom environment
- Facilitating in-class group discussion and activity
- Exchanged email with students about their course-related questions
- Applied grading rubric for written assessments of essays, examinations,

and other assignments

SPH-H263 Personal Health
2012
- Assisted maintaining healthy classroom environment
- Facilitating in-class group discussion and activity
- Exchanged email with students about their course-related questions
- Applied grading rubric for written assessments of essays, examinations, and other assignments

SPH-H315 Consumer Health
2010
- Assisted maintaining healthy classroom environment
- Planned and directed weekly tutorial sessions
- Applied grading rubric for written assessments of essays

RESEARCH EXPERIENCE

School of Public Health, Indiana University Bloomington
Principal Investigator
2010-2015
Dissertation study "Western Organizational Change Capacity Theory and Its Application in Chinese Public Health Organizations: A Multiple Case Analysis"
- Designed grounded theory research framework
- Developed literature review on comparison of health reform and health care status between China and the US, ecological model, organizational change theories, and organizational health studies in China
- Applied in-depth interview, focus group interview, and follow-up questionnaire data collection methods in Chinese public health organizations including public hospitals, local government health agencies, and community health centers.
- Translated, transcribed, entered, and analyzed data collected from interview and questionnaire
- Summarized research findings and suggestions for future study

Public health Policy Group, School of Public Health, Indiana University Bloomington
Co-Principal Investigator
2011-2012
"Effectiveness of state-level tobacco control policies"
- Conducted secondary data analysis on smoking status in years before and after the effective date of state smoking ban in each state by applying chi-square tests on data collected from The Behavioral Risk Factor Surveillance System (BRFSS)

School of Public Health, Indiana University Bloomington
Principal Investigator
2012
"Intention of suicide among international college students in United States universities"
- Managed interviews to international students at Indiana University about their emotional status and intention of suicide
- Transcribed, analyzed, and summarized interview data

School of Public Health, Indiana University Bloomington

Research Assistant

2010-2011

Principal Investigator Dr. Robert Goodman,
School of Public Health, Indiana University Bloomington

- Collected literature in "Community leadership in health Promotion"
- Developed literature review on "Community leadership in health Promotion"

Women in Science Research Poster and Career Conference, Indiana University Bloomington

Co-Principal Investigator

2010

"Chinese-American Women's Health in US"

- Developed literature review on studies on Chinese-American women's health in recent years
- Summarized comparison of Chinese, American, and Chinese America women's health in different period of time

Health Behavior in School-age Child Project (HBSC), Beijing, China

Research Assistant

2007-2009

Principal Investigator Dr. Huazhen Zhou, China Youth University for Political Sciences

"Risk Behavior among Chinese School-age Child"

- Translated English reports into Chinese during literature review process
- Conducted in-depth interviews among Chinese high school students, parents, and teachers
- Managed interview data analysis

APPOINTMENT

Bureau of Beijing Medical and Health System Reform, Beijing

Assistant to the Director

2014

Director Xuewen Long

- Accomplished daily office tasks
- Assisted writing a comprehensive proposal on "The Establishment of Beijing International Medical Zone"

Xinhua News Agency Shaanxi Branch, Xi'an, Shaanxi, China

Assistant Editor

2007

- Edited newspapers
- Collected materials including daily news and literature from other newspapers and websites
- Published several online reports on daily news

Tang Dynasty Imperial Tea House, Xi'an, Shaanxi, China

Tea Sommelier

2006

- Perform tea ceremony to promote Chinese tea culture

VOLUNTEER

Auditorium, Indiana University Bloomington
Usher Volunteer
2011-2012
- Guide seats to audience at the auditorium

Coca-Cola Shuang experience center (SEC), Beijing, China
Volunteer Tour Guide
2008
- Guide tourists in Heritage Gallery of SEC during 2008 Beijing Olympic Games
- Guide tourists in Heritage Gallery of SEC during 2008 Beijing Paralympic Games

HONORS & AWARDS

School of Public Health, Indiana University Bloomington
Health Behavior Research Scholarship - $2000
2013

Coca-Cola Shuang experience center (SEC), Beijing, China
Excellent Employee Award - $500
2008

China Youth University for Political Sciences, Beijing, China
Public Welfare Scholarship - $800
2006-2007

China Youth University for Political Sciences, Beijing, China
Social Work Scholarship - $800
2006-2007

PRESENTATIONS

Zhao, X., Chen, B. (2012). Effectiveness of state-level tobacco control policies, Oral Presentation, Student research series, School of Public Health, Indiana University Bloomington

Zhao, X. (2010). *Suicide Intention among international college students in US*, Poster session presented at Ethnographic & Qualitative Research Conference, Cedarville, Ohio.

Zhao, X., Yang, D., & Liu, J. (2010). *Chinese-American Women's Health in US*, Poster session presented at Women in Science Research Poster and Career Conference, Bloomington, Indiana

PUBLICATIONS

Zhao, X., (2008, August 15). Feeling the International Giant Companies with Chinese Characteristics, *All Circles Newspaper*, No. 2569 3rd Edition

Zhao, X., (2008, August 13). "Olympic Games make a connection between you and me", *All Circles Newspaper*, No. 2566 3rd Edition

Zhao, X., (2008, August 9). “2008 Olympic Games Shuang Experience”, *All Circles Newspaper*, No. 2536 3rd Edition